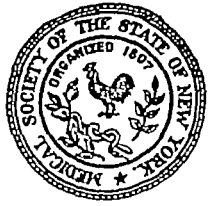
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For alphabetical index of authors and subjects see pages 2731–2738

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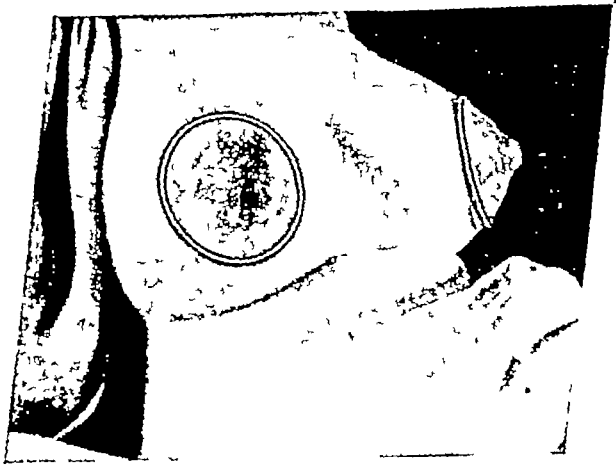
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CONTENTS

SCIENTIFIC ARTICLES

Estrogens in Diabetes, *Harold Marcus, M D* , and *Sol Glotzer, M D* 1461

The Use of a New Antihistaminic Combination in the Treatment of Allergic Disorders, *Earl B Brown, M D* , and *Frederick W Brown, M D* 1465

Devices for the Rapid Recording of the Unipolar Electrocardiogram, *Abraham Lieberson, M D , A A C P* , and *A Allen Goldbloom, M D , F A C P* 1467

Streptomycin and Surgery in the Treatment of Tuberculous Joints, *Arthur A Mechele, M D* , and *Frederick J Krueger, M D* 1470

A Clinical Evaluation of Neo-Antergan and Antistine in the Treatment of Ragweed Hay Fever, *Louis Levin, M D , John F Kelly, M D* , and *Emanuel Schwartz, M D* 1474

Streptomycin in Chronic Tuberculosis, *J N Hayes, M D , F A C P* , and *H Frazer Parry, M D* 1477

Gangrene of Both Legs Following Femoral Vein Ligation, *Jacob Sarnoff, M D* 1480

The Treatment of Venous Thrombo-Embolism, *Stuart W Cosgriff, M D , Richard J Cross, M D* , and *David V Habif, M D* 1483

(*Continued on page 1428*)



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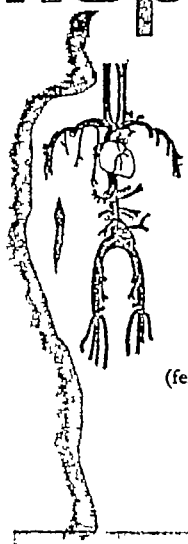
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(CONTENTS—Continued from page 1426)

What Is Normal Blood Pressure?, *Henry I Russek, M D , F A C P* 1485
Surgical Treatment of Hypertension, *David P Boyd, M D , F R C S* 1487
The Electrocardiogram in Catatonic Schizophrenia, *Stephen Major, M D* 1489
Pilonidal Cyst Surgery—a Modification, *Alfred J Cantor, M D* 1492
Management of Severe Postlumbar Puncture Headache, *Robert E Ahearn, Lt j g , (MC) USNR* 1495

CASE REPORTS

Carotid Sinus Syndrome, *Milton H Morris, M D* 1499
Unusual Reaction to Thiouracil, *Irving Greenfield, M D , F A C P* 1501
Dystrophia Myotonica Complicated by Thrombo-Angiitis Obliterans and Pseudo-hypertrophic Muscular Dystrophy, *Irving Leinwand, M D* 1503
Delayed Reaction to Penicillin Treated with Thephorin, *Irwin I Lubowe, M D* 1505
Congenital Absence of the Gallbladder with Obstructive Jaundice Due to a Solitary Gallstone, *Francis X Timoney, M D* 1506
Friedländer Bacillus Pneumonia Treated with Streptomycin, *John H Keating, Jr , M D* 1507

EDITORIALS

Professional Services in Hospitals 1457
Current Editorial Comment 1458
The President's Page 1460

GENERAL FEATURES

Necrology 1510
Medical News 1511
Hospital News 1518
Books 1528

MISCELLANEOUS

Department of Medical Care Insurance 1509
County Society Officers 1532
State Society Officers 1430, 1432, 1434





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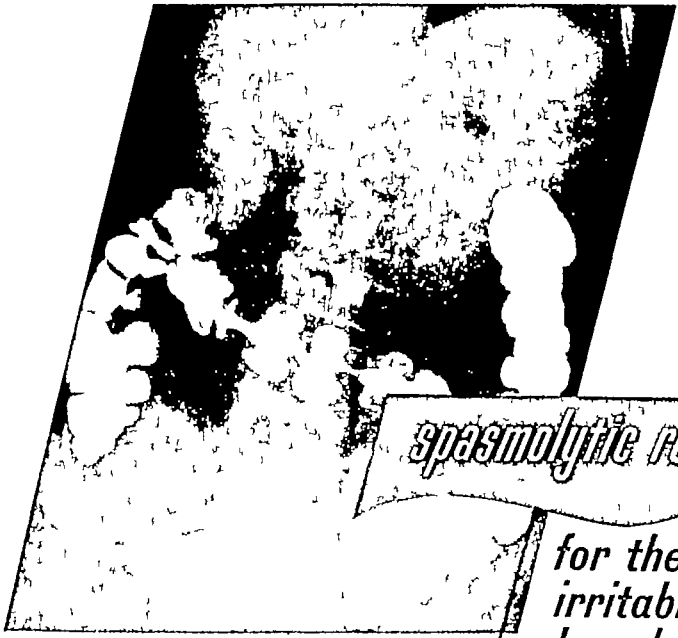
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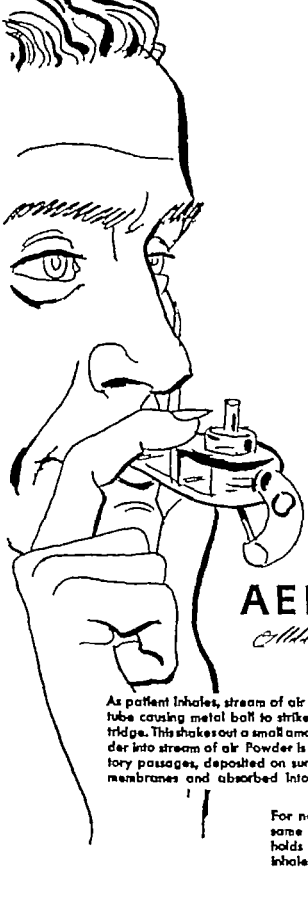
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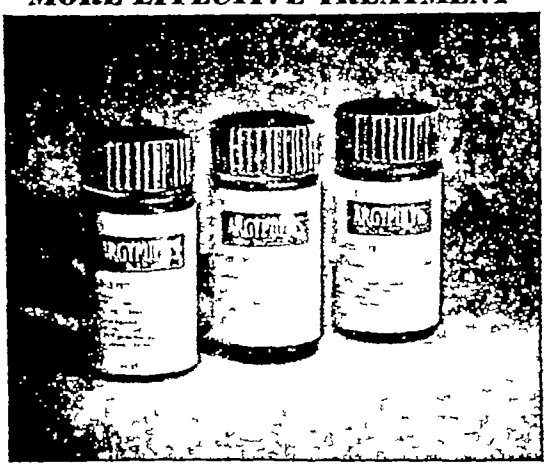


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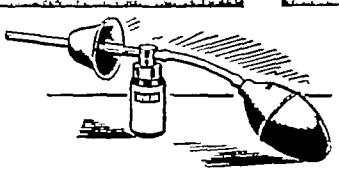
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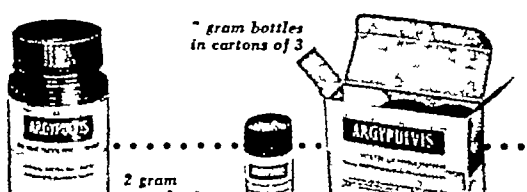
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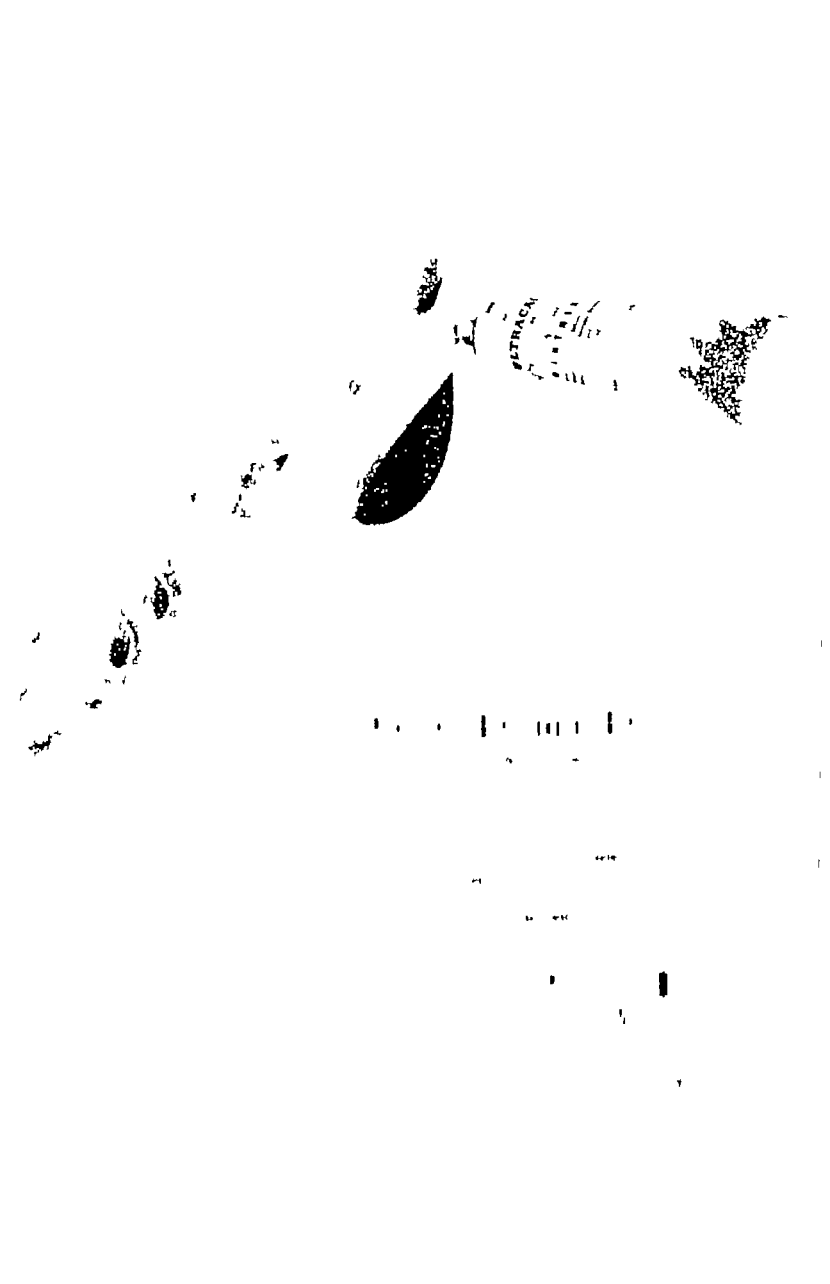
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**Reich, Button and Nechtow, "Treatment of Trichomonas Vaginalis Vaginitis," Surgery, Gynecology and Obstetrics, May 1947, pp 891-896*



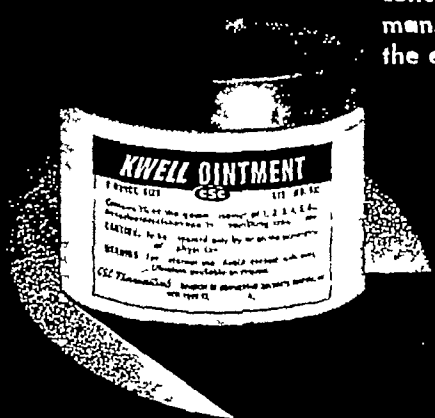
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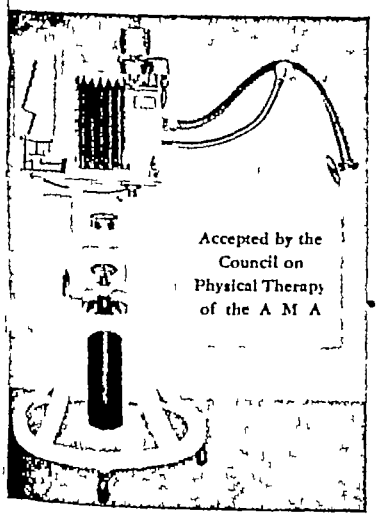
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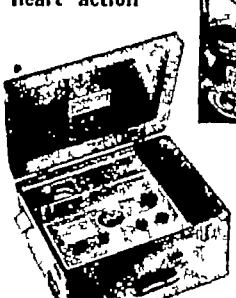
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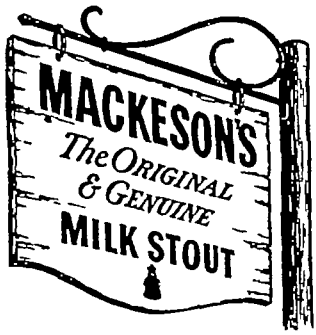
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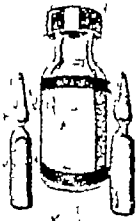
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INDEX TO ADVERTISERS

Abbott Laboratories	1435
The Alkalol Company	1527
American Hospital Supply Corporation	1429
American Meat Institute	1534
A. C Barnes Company	1436
Dr Barnes Sanitarium	1531
Bilhuber-Knoll Corp	1434
Borden s Prescription Products Division	1451
Brigham Hall Hospital	1531
Bristol Laboratories Inc.	1423 1525
Brown s Medical Bureau	1529
Brunswick Home	1531
Certified Blood Donor Service	1446
Chatham Pharmaceuticals, Inc.	1437
Ciba Pharmaceutical Products, Inc.	2nd cover
Colin Pharmacal Co. Inc.	1426
Commercial Solvents Corporation	1438
Copiague General Hospital	1529
The De Leoton Company	1442
Doak Co , Inc	1446
Falkirk in the Ramapos	1531
Greenwich Village Beverages, Inc	1442
Halcyon Rest	1529
Hoffmann La Roche Inc	1448
Holbrook Manor	1529
Homemakers Products Corporation	1527
Interpines	1531
Lanteen Medical Laboratories Inc.	1455
The Liebel-Flarsheim Co	1428
Eli Lilly and Company	Between 1456-1457
Louden-Knickerbocker Hall Inc.	1531
Mandl School	1527
The Maples, Inc.	1531
Mead Johnson & Co	4th cover
Philip Morris & Co Ltd. Inc	1454
National Discount & Audit Co	1529
Paine Hall	1527
Pinewood	1531
Plastishield Inc.	1424
Raymer Pharmacal Company	1452
L. & B Reiner Inc.	1441
R. J Reynolds Tobacco Co	1425
J B Roerig and Company	1427
Schenley Laboratories Inc.	1450
Schering Corporation	1443
G D Searle & Co	1433
Sharp & Dohme	1456
Smith Kline & French Laboratories	1439 1447 1453 3rd cover
Standard Pharmaceutical Co Inc.	1529
Marvin R. Thompson Inc	1445
Charles B Towns Hospital	1529
William R. Warner & Co Inc	1449
West Hill	1529
Winthrop-Stearns Inc.	1431
Wyeth Incorporated	1444

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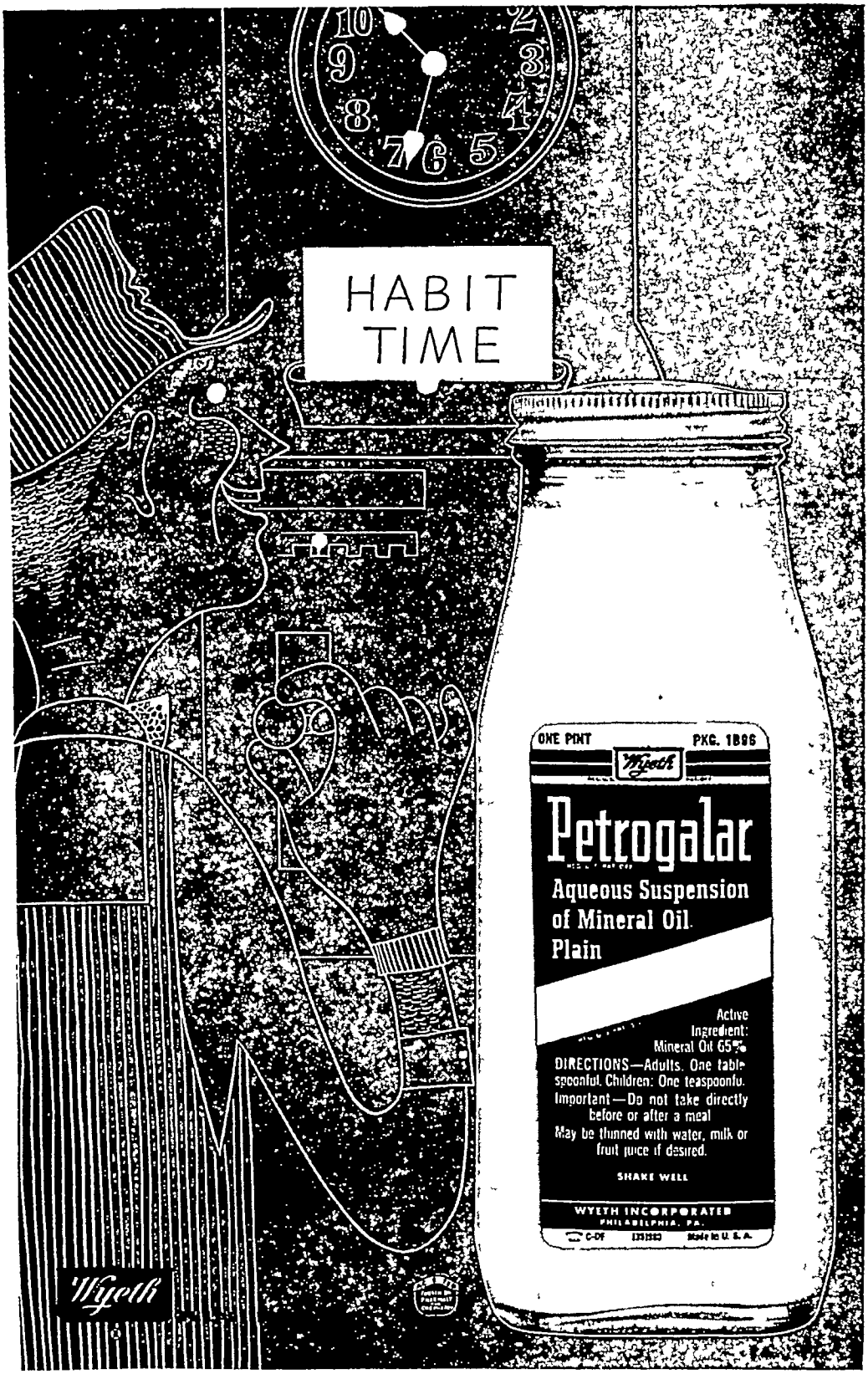
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BIBLIOGRAPHY (1) Fluhmann, C. F. J.A.M.A. 128:557, 1945. (2) Frank, R. T.: M. Clin. North America 25:607, 1941. (3) Kroka, L., and Harris, J. M. Am. J. Obst. & Gynec. 43:93, 1941. (4) Harding, F. E. Am. J. Obst. & Gynec. 33:279, 1937.

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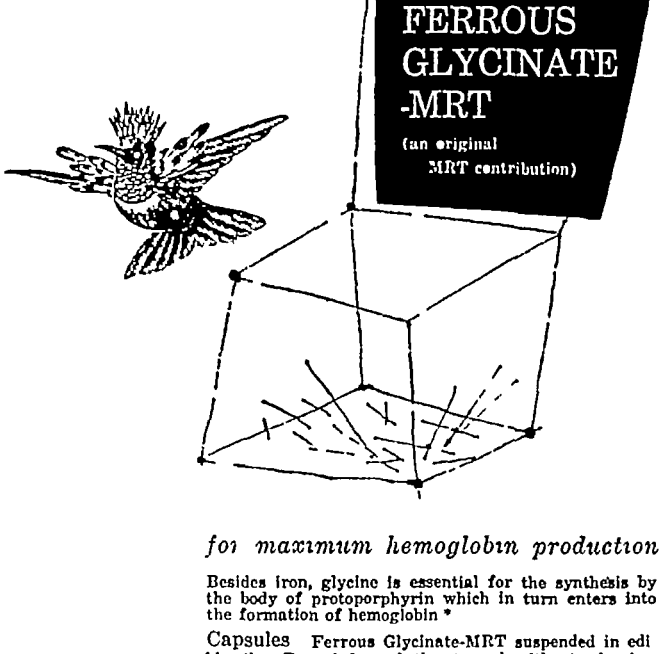
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Sherman, D. and Rittenberg D The Utilization of Glycine for the Synthesis of Porphyrin, J Biol. Chem. 155:547 1945

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INDEX TO ADVERTISED PRODUCTS

Acnomel (Smith, Kline & French Labs) 1447
Aerohalor (Abbott Laboratories) 1435
Alkalol (The Alkalol Company) 1527
Antistine (Ciba Pharmaceutical Products, Inc) 2nd cover
Argypulvis (A C Barnes Company) 1436
Baxter Solutions (American Hospital Supply Corporation) 1429
Benzebar (Smith, Kline & French Labs) 3rd cover
Cremosuxidine (Sharp & Dohme) 1456
Dexedrine Sulfate (Smith, Kline & French Labs) 1439
Diapene (Homemakers' Products Corporation) 1527
Edrisal (Smith, Kline & French Labs) 1453
Essenamine (Winthrop-Stearns Inc) 1431
Ferrous Glycinate (Marvin R. Thompson, Inc) 1445
Flo-Cillin "96" (Bristol Laboratories Inc) 1423
Hemosules (William R. Warner & Co , Inc) 1449
Heptuna (J B Roerig and Company) 1427
Kwell Ointment (Commercial Solvents Corporation) 1438
Lanteen Jelly (Lanteen Medical Laboratories, Inc) 1455
Liquiderm (Colin Pharmacal Co , Inc) 1426
Nucarpon (Standard Pharmaceutical Co , Inc) 1529
Ohodin (The De Leoton Company) 1442
Palapent (Bristol Laboratories Inc) 1525
Pavatrine (G D Searle & Co) 1433
Pelvicins (Schenley Laboratories, Inc) 1450
Petrogalar (Wyeth Incorporated) 1444
Proluton (Schering Corporation) 1443
Ray-Formosil (Raymer Pharmacal Company) 1452
Salimidol (Doak Co , Inc) 1446
Theocalcin (Bilhuber-Knoll Corp) 1434
Thephorin 'Roche' (Hoffmann-La Roche Inc) 1448
Ultracain Ointment (Chatham Pharmaceuticals, Inc) 1437

Dietary Foods

Biolac (Borden's Prescription Products Division) 1451
Dextri-Maltose (Mead Johnson & Co) 4th cover
Meat (American Meat Institute) 1534

Medical and Sugical Supplies

Cardiotron (L & B Reiner, Inc.) 1441
Diathermy (The Liebel-Flarsheim Co) 1428

Miscellaneous

Cigarettes (R. J Reynolds Tobacco Co) 1425
Cigarettes (Philip Morris & Co , Ltd , Inc) 1454
Milk Stout (Greenwich Village Beverages, Inc) 1442
Plastishield (Plastishield, Inc.) 1424
Sheep Cells (Certified Blood Donor Service) 1446

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ACNOMEL's superior vehicle embodies an entirely new principle in topical acne therapy To this vehicle —a stable, grease free, flesh tinted hydrosol— Acnomel owes the following important advantages

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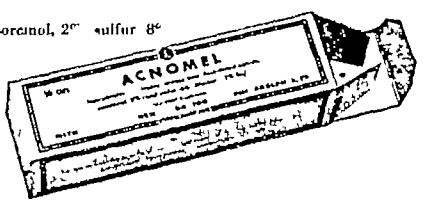
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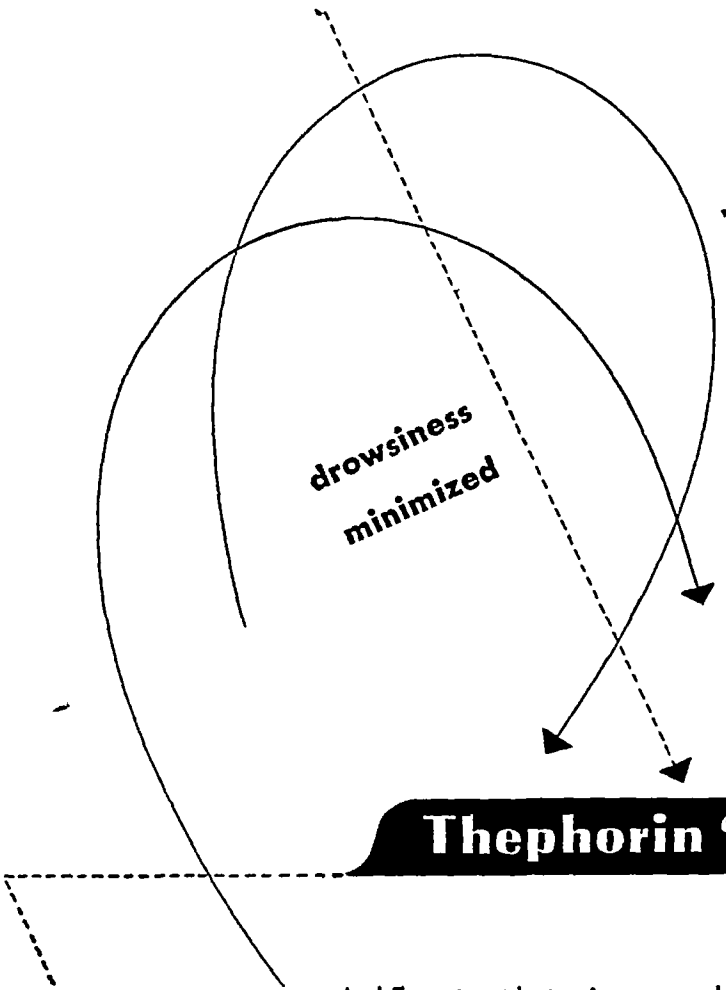


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Active ingredients resorcinol, 2% sulfur 8%





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A *different* antihistamine enables patients to stay at work . drive car play because there is very little likelihood of drowsiness or other disturbing side reactions highly effective in allergic disorders especially hay fever 25-mg tablets also a palatable syrup for children (10 mg per teaspoonful)

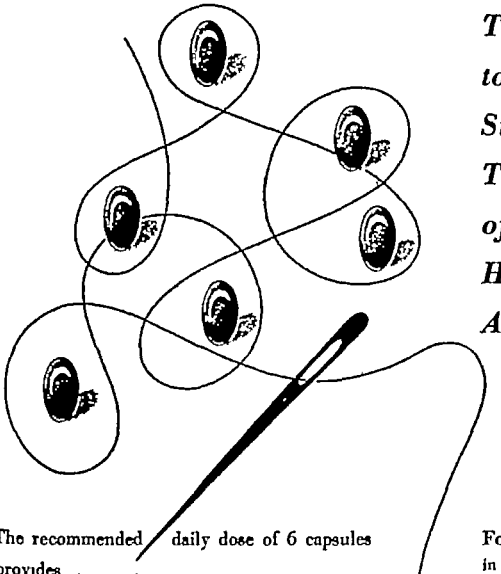
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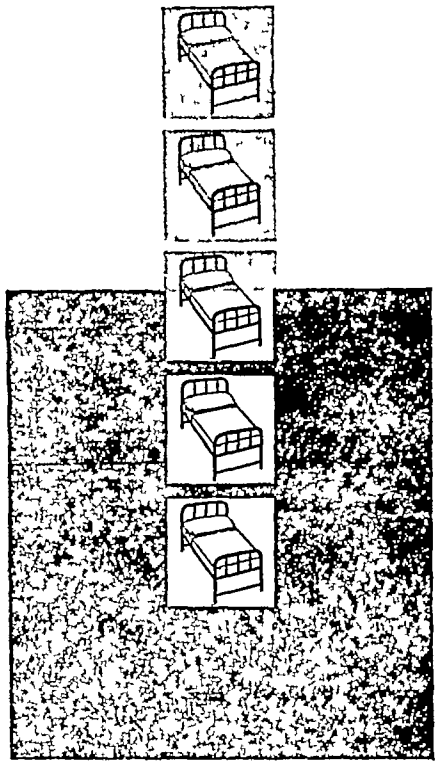
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Pelvicins*

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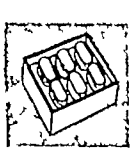
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1 Pierce, R. R.: Am. J Obst. & Gyneo. vol. 55 (Feb.) 1948.

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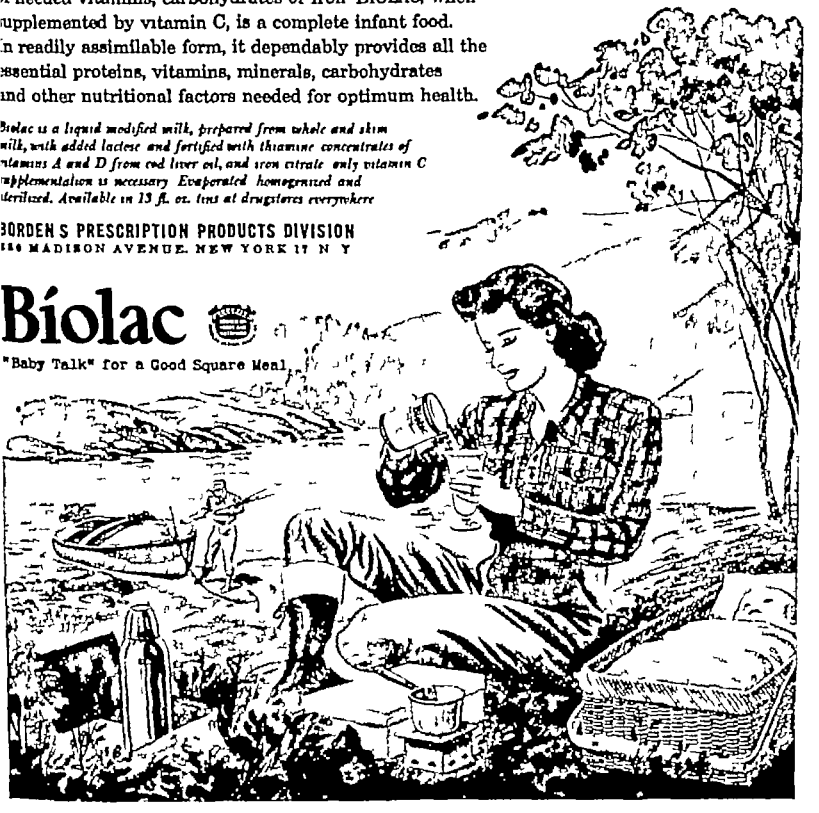
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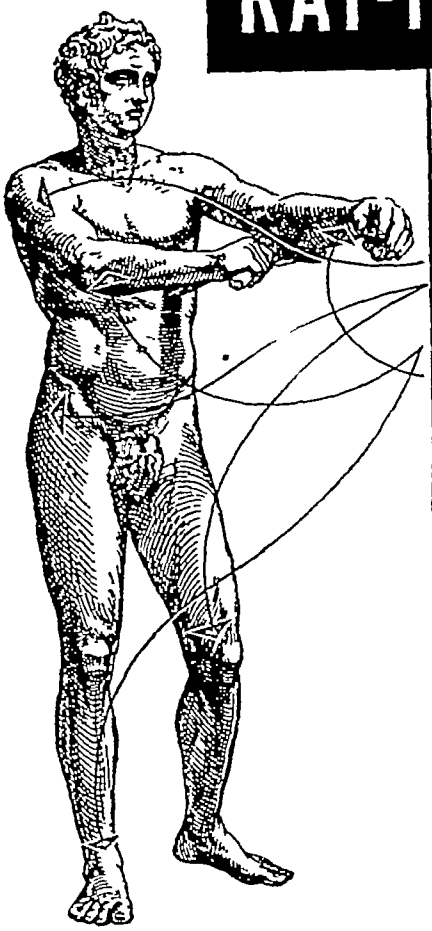
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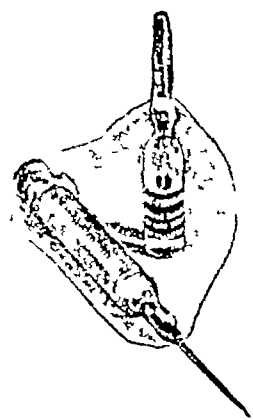
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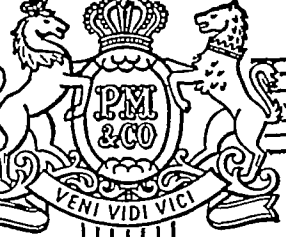
Best results are usually obtained with a dosage of *two* tablets, repeated every three hours, if necessary.

*Long, C. F., M.D. Edrisal in the Management of Dysmenorrhea. Indust. Med. 15:679 (Dec.) 1946. Indust. Nurs. 5:23 (Dec.) 1946.

highly effective in the relief of pain

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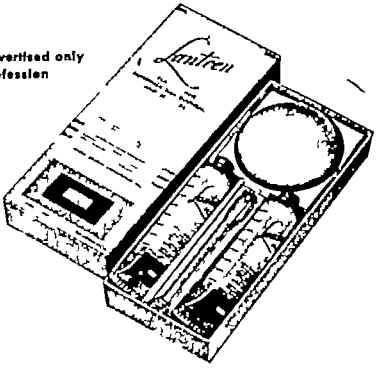
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1 Frant, S., and Abrahamson H. *Brennemann's Practice of Pediatrics*, 1.28.22, 1945

2. Blattner, R. J *J Pediatrics*, 32.220 February 1948.

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Editorials

Professional Services in Hospitals

A recent issue of the *New England Journal of Medicine* discusses one of the current problems of the medical profession and the hospitals, about which something will have to be done [1] Says the above source in part

particularly vexing have been the difficulties encountered as a result of Blue Cross payment of certain professional services rendered within hospitals and the relation between hospitals and staff physicians in certain branches of medicine The criticism has been made by these staff physicians—anesthesiologists, pathologists and roentgenologists in particular—who may be on full-time or part-time salaries, that employing hospitals have made a profit on their salaries and that Blue Cross, by arbitrarily including their services in its coverage, has classified the product of their training and experience as a hospital rather than a professional service

They have thus been classified, it appears from their contention with the clerks of a store or the employees of an industry from whose earnings a legitimate profit might be expected

In an attempt to evaluate any grievance that any party may have, the purpose of professional organization should be clearly defined It may be assumed that the first object of all medical organization is to provide the patient with the best possible care A second legitimate object is to assure for the physician a decent and dignified standing in his community and a living commensurate with his ability and its industrious employment

It is admitted that Blue Cross has blundered, it is apparent also that some hospitals have erred in failing to establish proper relations between staff and administration The mistake is common when businessmen, occupied chiefly with balance sheets have jurisdiction over institutions that are staffed by professional men jealous of the ethics and etiquette of their profession Even the physician turned director is too often found at least in the eyes of his former colleagues worshipping the golden calf instead of heeding the commandments written in stone. [1]

The matter is important Until some intelligent attack is made the blundering will continue, to the detriment of the medical profession, the hospitals, and particularly the patients who, in this instance, are the innocent bystanders

[1] New England Journal of Medicine, April 29 1948, p. 640.

A committee was appointed by the Council of the Massachusetts Medical Society in the spring of 1947 "to define hospital services and medical services and to establish the proper relations between physicians and hospitals" This committee, composed of representatives of the anesthesiologists, the pathologists, and the roentgenologists, the Blue Cross, the Blue Shield, the Hospital Association, and the Massachusetts Medical Society, labored long and faithfully during the hot and humid summer that ensued It brought in a unanimous report that has so far been unimpeachable and that defined as medical hospital services those "other than administrative, rendered by a registered physician directly to or in behalf of an individual patient for the obtainment and interpretation of data, including consultation and advice, for the diagnosis, treatment, and prevention of disease"

These services, specifically, were defined as embracing "the general and special practice of medicine, surgery, and obstetrics, and the practice of the related specialties including anesthesiology, physical medicine, radiology, pathology, and clinical pathology "

A basic principle recommended in the report was that each department (so far as possible) be self-supporting and that neither the hospital nor the physician rendering the service should exploit the patient or each other The basis of financial arrangement, however, migl salary, commission, fees or any other n that would best meet the local situation

Certain questions are not easily ans Is a nurse anesthetist, operating under tor's orders, acting as his agent in a r capacity or is she engaged in the prac medicine? The point is open to debate a chemist, conducting his own clinical l tory, perform an analysis and report the to the physician submitting the materia does not presume to make a diagnosis? organized pathologists believe not, but again, there is room for disagreement [1]

Discussion of this report by similar g in the various states might be highly in evolving a workable and fair practi which all parties at interest could b It seems to be a matter in which the medical societies could well assume l ship The pioneering work has beer done by the Massachusetts Medical S and should be followed up The probl pressing, for the medical profession to it would be to evade a grave respons and to invite attempts at solutio agencies less well qualified to bring to in a judicial spirit all parties at interes

Current Editorial Comment

Topectomy The therapeutic effect of frontal lobe leucotomy (psychosurgery) has aroused the interest of psychiatrists in all parts of the world Unfortunately, the outcome has been found to be unfavorable in some 30 per cent of cases, as well as having a mortality of 3 to 5 per cent In an effort to rationalize this organic approach to mental disease, a medical-surgical-scientific group of 96 collaborators known as the Columbia-Greystone Associates was constituted at the Columbia-Presbyterian Medical Center and Greystone Park State Hospital in New Jersey

A group of "back-ward" patients at Greystone Park were subjected to a most elaborate and intensive study including practically every variety of laboratory, medical, and psychiatric examination available From the patients, half were selected for operation, and half were retained as controls A systematic schedule of brain operations, designated as "topectomy", was devised sc bilaterally symmetric portions of the fi lobes were excised in such a fashion tha entire area of the brain could be studiec the localized or mass effect of such c tions

Four months after operation, 20 of t operated patients were considered b hospital parole board to be improved tc a degree that they could be paroled fro hospital Only four of the 24 contrc tients were recommended for parole were no patients in a worsened condit a result of the operation

Intensive follow-up studies showed those patients in which Brodmann's nine, ten, and 46 had been excised sh the greatest improvement This imp ment was chiefly marked by a loss of chotic anxiety and complaint There w clear or permanent loss in intellect, abil learn or remember, in abstract attitu

motor speed or coordination, or in verbal facility shown by any operated patient Indeed, rather than mental impairment, the general over all picture was one of mental amelioration which the investigators attribute to the decrement in psychotic effect

The success of the procedure is most encouraging, and further applications of the technic are now being planned, although still as a research investigation

Confidential Report "What the Birth Record Means for a Child" by Helen C Huffman, social science analyst, National Office of Vital Statistics, U S Public Health Service is the title of a paper given at the National Conference of Social Work, April 13 to 19, 1947, at San Francisco [1] In this paper Miss Huffman discusses the value of the birth record to the individual in later life and points out some instances in which the lives of people are affected in an endless variety of ways by the information or misinformation contained therein

Will Rogers, says Miss Huffman, said of a birth certificate "The purpose of a birth certificate ain't to prove that you've been born—but when, where at, and who to"

But answers to questions on the certificate may be misleading at times A young man didn't get a job for which he was applying because his birth certificate under 'Occupation of Father' had been answered 'In an insane asylum' The fact was that the father was the chief psychiatrist in a hospital for mental illnesses, not a patient"

Miss Huffman then proposes to take technics of registration from various states and to arrange the data in 3 sections She says

> The certificate could be arranged so that the legal items of name and date and place of birth could be placed at the top of the form. As a second portion information about the parents could be entered Then, in a confidential part of the document, the doctor could record numerous items of important statistical health information The question of legitimacy or illegitimacy would also be placed in this confidential part When a person needs proof of birthplace and birth date, the certified copy could then be made by taking a picture of only the first section The second portion could be included in the picture when a person needs proof of parentage *The confidential information would never be given into public hands* [2]

[1] The Child, 2 137 (June) 1947
[2] Italics ours—Ed.

Miss Huffman deplores the fact that birth certificates, as they are issued indiscriminately at present in various states, display numbers of facts that should never become public knowledge But then she goes on to say that birth certificates should carry much more information than they do now We would agree with her, if we had the same confidence that she has in the 'Democratic State' We haven't Nor in any kind of 'State'

Once you have every bit of available information registered in regard to every unfortunate child born into this changing world, you have a statistician's paradise Once you have those statistics *on file*, Damocles' sword is dangling over the head of every citizen

Again we quote Miss Huffman

> The confidential information would never be given into public hands

We wish we shared her confidence We fear that, once those statistics were on file, both public and private hands would be reaching into them

We have every sympathy with her desire for uniform birth certificates We see perfectly how, if she carried her point, masses of statistics in this country could be much better than they are now We like everything about Miss Huffman and her article except her sentence, which we quote again

> The confidential information would never be given into public hands

We stress this point, because it is our only point of disagreement with Miss Huffman's otherwise excellent suggestions for improving birth records There is no question of the value of better statistical information But in our view a birth record is a public document Therein lies its value to society and to the individual himself We fail to comprehend how such a record can be both a public document and a private, reserved record at the same time

Confidential information of the sort here under discussion, constituting the third part of the record, might or might not remain so We have not the unreserved confidence in human nature evidently possessed by Miss Huffman Also we are old enough to avoid using the word 'never', we would urge similar avoidance upon social science analysts

The President's Page

The Medical Society of the State of New York may be likened to a great ship that has braved the seas through many, many years



Its keel is made of timbers that represent the great principles that have always guided us, namely, to preserve the ideals of the medical profession, to seek its honor, to maintain ethical standards, and to defend its rights and privileges—to raise ever higher the educational requirements for those seeking to practice medicine—all to the end that we may give an ever more perfect service to the people

On this keel a superstructure has been laid by a succession of great self-sacrificing men, and its joints have been caulked and held firm over the years by the work of innumerable committees in the deliberations and decisions of the House of Delegates

The whole medical profession of New York State are passengers on this ship Only a small percentage of the doctors are earnestly helping to keep this ship of medicine on her course These few are working diligently, but the medical profession needs the thoughtful cooperation of all

All owe much to the members of the medical profession, whose high standards have made them what they are, and, in addition, all have a deep obligation to the doctors who will come after We must hand down to them a great heritage

People as a whole love and respect us and want to continue to do so To lose that love and respect may be easier than to retain it, but retain it we must at all costs

Our dignity, our future, our freedom to give our fellow men the high service to which they are entitled depend upon it It is our greatest bulwark against those who would regiment us Every doctor is, in fact, a public relations man for the medical profession

I want to emphasize the importance of the individual physician—one actuated by the thought that the practice of medicine is a vocation, not a business In the last analysis it is the doctor who is the determining factor of the worthwhileness of the whole system of the care of the sick He is the sine qua non

With these few thoughts I bring you my greetings as your president From time to time during the coming year "My Meditations," so to speak, will appear on this page I hope they may have some interest and appeal

LEO F SIMPSON, M D
President

Scientific Articles

ESTROGENS IN DIABETES

HAROLD MARCUS M D , and SOL GLOTZER, M D , Brooklyn, New York

(From the Medical Service of the Jewish Sanatarium and Hospital for Chronic Diseases)

IN RECENT years, the literature pertaining to the extrapancreatic endocrine factors in diabetes mellitus has grown to large proportions It is not our desire to add to these volumes but we have been impressed with the difficulty of evaluating properly the results obtained by the use of sex hormones in the treatment of diabetes because of the tendency for carbohydrate tolerance to increase under therapy with diet and insulin alone

The accessory treatment of diabetes with sex hormones has a rational basis Houssay and his school, a number of years ago, established some important facts In hypophysectomized animals, blood sugar levels fall, probably due to a diminution in neoglycogenesis and not due to any effect on insulin production In fact there occurs a marked increase in sensitivity to insulin against which the hypophysectomized animal can be protected by prior injection of the necessary anterior pituitary extract. Diabetes produced by pancreatectomy will disappear if the hypophysis is removed and will reappear if the hypophysis is implanted, or if suitable extracts are injected The factor responsible for these effects is called the "diabetogenic factor,' supposedly produced by the anterior pituitary gland

Young succeeded in producing a permanent diabetic state in dogs by repeated injections of an anterior pituitary extract over a long period, and in many of his animals the diabetes persisted even after discontinuation of the injections [1] Marked degeneration of the islets of Langerhans was noted suggesting that the action of these extracts was through the pancreas

Another mode of action of the diabetogenic factor must also be considered. Aggravation of diabetes is noted in pancreatectomized hypophysectomized animals in which the anterior pituitary extracts are injected Since it obviously cannot act through the pancreas, it possibly acts through the liver, stimulating transformation of glycogen into glucose and at the same time, inhibiting the utilization of glucose by the tissues As proof it has been shown that the effect of anterior pituitary hormones is abolished by hepatectomy in animals

The presence of a specific diabetogenic factor can only be surmised from these experiments but as yet no specific hormone has been isolated The association of growth and diabetogenic action in extracts of the anterior pituitary gland has been noted [2] The extract is believed to contain a pancreatotropic hormone which increases insulin secretion and, by increasing nitrogen retention causes a gain in weight It is also believed to contain a diabetogenic hormone which either increases carbohydrate formation or depresses its oxidation Much of the diabetogenic activity of the pituitary gland is mediated through the adrenal cortex which by itself can also stimulate glyconeogenesis in the liver and inhibit glucose utilization These findings indicate a close association between a number of glands to produce an effect on metabolism which might seem to be the action of only one hormone. How much part the growth factor plays is not known, but that it is important is indicated by the decrease in insulin content of the pancreas produced by the administration of purified growth preparations

Diabetes frequently has been seen with clinical manifestations of pituitary disturbances White looked for evidences of pituitary hypersecretion in juvenile diabetics [3] She found that many were taller than normal and had more advanced bony and dental development prior to the onset of diabetes but these evidences did not persist after several years She also found dwarfism in 94 of 177 cases and suggested, as an explanation for this apparent contradiction, that the pituitary body had become exhausted Diabetes occurred in 17 per cent of cases of acromegaly in one series 9.2 per cent in another Rocca and Perez reported a case of acromegaly with diabetes which showed resistance to the insulin sensitivity test and responded to treatment with estrogenic hormone [4]

The use of estrogen to depress the diabetogenic hormone arises from this possible association of the former with the growth and sex hormones in the secretory cell. Subcutaneous implantation of tablets of diethylstilbestrol estriol, and estra-

Estrogenic hormone used in this study was Progynon B, generously supplied by Dr W H Stoner of the Schering Corporation.

diol in rats caused an increase in insulin content in the pancreas, an action believed to be mediated through the anterior pituitary, since hypophysectomy neutralized the effect Ligation of the ovaries in rats produced specific changes in the hypophysis, preventable by injection of estrogens

Zondek found that estrogen inhibits the gonadotropic and growth factors of the pituitary [5] Long-continued injection of estrogen causes enlargement and increased vascularity of the gland, with an increased number of chromophobe cells and actual formation of adenoma Zeckwer reported an increased number of chromophobe cells showing mitoses and hypertrophy of the Golgi apparatus and mitachondria, following estrogen injection, and found that production of follicle-stimulating and growth hormones decreased, while lactogenic hormone increased [6] Segaloff and Dunning prevented pituitary enlargement by the simultaneous administration of testosterone [7]

Foster studied the effect on the pituitary of rats of implanting synthetic estrogens and found enlargement with a marked increase in large chromophobes which are considered degranulated chromophil cells [8] He described the secretory cycle as consisting of the regular accumulation and release of specifically stainable granules by the chromophil cells, the effete cells being replaced by the growth and differentiation of small chromophobes, which are inactive and not secretory An equilibrium exists normally between granulating and degranulating chromophils until, with exhaustion of the cell, permanent degranulation occurs, ending in conversion to the inactive chromophobe cell A similar equilibrium exists between large and small chromophobes Hypertrophy of the Golgi bodies, which is the best indicator of secretory activity in the cell, also points to this increased stimulation Since growth and follicle-stimulating factors are believed to be produced by the chromophil cells, a decrease in their activity should be accompanied by a decrease in diabetogenic factor Spark compared the effect on the pituitary of estrone and estradiol benzoate in equivalent doses and found that all cases receiving estradiol, but only one those of receiving estrone, showed hyperplasia [9] Diethylstilbestrol had the same effect in rats, i e , enlargement of the pituitary, with degranulation of chromophil cells and an increase in chromophobe cells Chorionic gonadotropin was found to initiate regranulation of chromophil elements, returning the gland to a normal appearance following the changes caused by estrogen

Diabetes occurs with greater frequency near the menopause Tuttle found, in 38 of 72 female diabetics, that the onset of diabetes and menopause coincided [10] An increased amount of gonadotropic hormone is found in the blood and urine at the menopause, indicating overactivity of the anterior lobe possibly due to the loss of restraining action of ovarian hormone With these effects in mind, Barnes, Regan, and Nelson first attempted the treatment of diabetes by estrogen [11] Many investigators have independently reached the conclusion that diabetes which appears with, or shortly after, the menopause is more amenable to this therapy Spiegelman, in a study of nine patients, found a greater reduction of insulin requirement (63 per cent) in the premenstrual group than in the postmenstrual group (42 per cent) [12] Gerber treated ten patients who were either menopausal or showed signs of hypovarianism or hypopituitarism with 30,000 to 60,000 international units of estrogen weekly for three months He reports marked improvement [13]

Striking in most reports of cases treated in this manner is the relatively short period of observation employed prior to administration of estrogen Diabetics are notoriously difficult to control, and in an ambulatory patient not hospitalized, such control for investigative purposes is made more difficult It is of utmost importance in evaluating the effect of a drug to be absolutely sure that all other factors are stationary In diabetics, this would mean a level of control which is unchanged for at least five months and close observation for any intervening physical factors which might alter the control We were fortunate in having a group of individuals in this series who were confined to an institution for chronic diseases for some time and were, therefore, under close observation for a sufficient period prior to the experiment to be sure of control

Material

We selected for the experiment seven women who had been hospitalized for conditions which rendered them incapable of much activity All were proved diabetics, had been on insulin for a long time, had received the same dosage for at least six months, and diabetes had developed either after the onset of menopause or had been aggravated by it in all cases Diet consisted of the regular ward menu, with no restrictions The usual menu consisted of approximately 1,400 to 1,500 calories daily with about 150 Gm of carbohydrate, 50 to 60 Gm of fat, and 65 to 75 Gm of protein After thorough examination to rule out pelvic pathology, the patients were injected with Progynon B, 6,000 rat units, intramuscularly twice weekly for a period of three months from March 26 to June 20, 1947 Blood and urine sugar were determined weekly Since no change was made in any other factors in the environment, any change which occurred could be ascribed to the hormone.

Case Reports

Case 1.—J J, aged 62 was admitted in November 1943 with bilateral pyramidal tract signs and a fracture of the right ankle. Menopause followed hysterectomy at the age of 43. Diabetes was discovered one year later and insulin became necessary at the age of 50 years. Hypertension had been present for eighteen years. Positive findings consisted of blood cholesterol of 305 mg. per cent, a small sella turcica and a sugar tolerance test which rose from a fasting level of 101 mg. to 427 mg. per cent at the end of three hours.

Between June 1944, and the beginning of the test period on March 26 1947 the blood sugar varied from 101 to 200 mg. with the use of 40 units of protamine zinc insulin daily. This dosage was continued until May 12 1947 when the blood level fell to 65 mg. Insulin was decreased to 30 units but a subsequent rise in blood sugar necessitated a return to the original dosage which was continued until the end of the test. The only improvement noted was a decrease in glycosuria during estrogen therapy and an increase following discontinuance.

Case 2.—L. G. aged 67 was admitted in 1944 with hypertension, left ventricular hypertrophy and arteriosclerotic cardiovascular disease. At 61 years a midthigh amputation of the leg was performed for diabetic gangrene and one year later she suffered an intertrochanteric fracture of the right hip. At 28 years, amenorrhea followed cesarian section. Diabetes was first discovered at 52 years and insulin was used from the start.

From November, 1944 until March 26, 1947 20 units of protamine zinc insulin were given daily. Sugar tolerance test showed a rise from a fasting level of 132 mg. to 333 mg. per cent at the end of three hours. Estrogenic hormone was begun on March 26, 1947 and on April 21 the blood sugar fell to 50 mg., necessitating a decrease of insulin to 10 units. No increase in insulin has been necessary to date two months after discontinuation of estrogen.

Case 3.—B. S. aged 77 was admitted in November 1946 ten months after a cerebral thrombosis with left hemiplegia. Menses had stopped at 38 years and diabetes was first discovered at 53 years. Her past history included several bouts of pneumonia, diabetic gangrene of the left heel which responded to conservative treatment and long-standing hypertension. Blood pressure was 170/90, the heart showed calcification of the aortic knob and left ventricular hypertrophy, and x ray of the skull revealed a normal sella turcica. Sugar tolerance curve rose from a fasting level of 117 mg. to 346 mg. per cent at the end of three hours. Since admission, protamine zinc insulin requirement remained at 20 units daily, and the blood sugar varied from 93 to 182 mg.

Estrogen was begun on March 26 1947 and on April 21 the blood sugar fell to 78 mg., necessitating a decrease of the daily dosage to 10 units where it has remained to date, two months after discontinuation of hormone injections. However, glycosuria recently increased.

Case 4.—I. S. aged 66 was admitted in March 1941 for hypertensive cardiovascular disease and blindness due to enucleation of the left eye and a cataract of the right eye. Menses ceased at 35 years. A bilateral oophorectomy was done for polycystic, papillary cystomata with hemorrhage at 55 years. Additional findings were benign adenoma of the thyroid and x ray evidence of decalcification of the sella turcica. Electrocardiogram revealed an old myocardial infarction. Diabetes was first discovered at age 63 and insulin was required from the onset. Sugar tolerance test showed a rise from a fasting level of 125 mg. to 355 mg. per cent at the end of three hours. Insulin requirements fluctuated from 15 to 45 units of protamine zinc insulin during 1943 and from December, 1943 to August 1945 she received a constant daily dosage of 20 units. Twenty five units were required from then until the beginning of estrogen therapy on March 26 1947.

The blood sugar fell to 60 mg. per cent on April 21 requiring a reduction of insulin dosage to 15 units where it has remained to date, more than two months after discontinuation of the injections. In spite of the reduction in insulin need, and in blood sugar level, glycosuria remained high throughout the period of observation.

Case 5.—R. R. aged 60, was admitted in January 1945 for left hemiplegia and hypertensive heart disease. Menses ceased at 50 years. Diabetes was first discovered at 54 years after she had suffered a stroke but insulin was not required until nine months later. Since June 1945 25 units of protamine zinc insulin were given daily and blood sugar levels ranged from 154 to 180 mg. per cent. With a sugar tolerance test the figures were as follows: fasting 140 mg. per cent, one-half hour 157 mg., one hour 204 mg., two hours 174 mg. and three hours 165 mg. During administration of hormone therapy no change in insulin requirement occurred. Subsequently this patient developed gastric complaints and hepatic disease with jaundice and died on September 30 1947 of gastric malignancy. This hepatic invasion by neoplasm may have had some influence on the result.

Case 6.—S. M. aged 62 was admitted in November 1946 for right hemiplegia which followed an influenzal infection during pregnancy at age 33. Hypertension was present with evidences of cardiovascular involvement. Diabetes was discovered at age 52 but no insulin was required until November 1946 ten years later. Sugar tolerance test showed a rise from a fasting level of 227 mg. to 371 mg. per cent at the end of three hours.

Estrogens were begun on March 26 1947. No change in insulin requirement resulted throughout the entire period. However during the period of hormone administration the level of blood sugar remained lower than in the periods before or after its use.

Case 7.—H. S. aged 60 was admitted in September 1944 with hypertensive cardiovascular disease, an equinovarus deformity of the right foot which resulted from poliomyelitis and subsequent attempts at surgical correction and a recent fracture of the left foot. Menses ceased at 52 years. Diabetes had been discovered five years previously at age 47 but no insulin was required until age 57. Since Novem-

ber, 1946, 40 units of protamine zinc insulin were given daily

Estrogens were begun on March 26, 1947, and on April 21 the blood sugar fell to 64 mg per cent, requiring reduction of insulin dosage to 30 units Vaginal bleeding occurred on May 20, easily controlled with 25 mg testosterone given intramuscularly To date, two months after cessation of treatment, no increase in insulin has been necessary

Results

The ages of these women ranged from sixty-two to seventy-seven years In two, the menopause followed surgical procedures, while in the other five it was natural In six of the cases, diabetes was first discovered after the onset of menopause In Case 7 the diabetes was premenopausal in onset, but no insulin was required until five years after cessation of menses Incidentally, this patient was the only one in whom vaginal bleeding occurred

The most notable effect in all the patients was the general feeling of well-being which resulted All said they felt much better during treatment, and this must be considered significant in view of the depressive atmosphere which usually exists in this type of institution In four cases (2, 3, 4, and 7), the daily insulin requirement was reduced to 10 units, and in one other (Case 1), the reduction was only temporary Two cases (5, 6) showed no change in insulin needs This reduction, while on the surface not remarkable, constitutes a decrease of between 25 and 50 per cent in insulin requirement and must be considered significant To date, we have followed these cases for two months after cessation of estrogen therapy, and as yet it has not been necessary to increase the insulin dosage Glycosuria increased after estrogen was stopped in three of the patients, and it is possible that this may presage a decrease in sugar tolerance in the near future Case 5 became sugar-free without any reduction in insulin dose

An interesting development occurred in six of our seven patients At the end of exactly four weeks of treatment in five cases and at the end of the seventh week in one case, the blood sugar level dropped considerably and relatively sharply, reaching almost to hypoglycemic levels It was at this point that reduction in daily insulin requirement became necessary, after which the blood sugar returned to a more level plane Case 6 did not require the reduction Several explanations for this phenomenon have been considered An increase in insulin sensitivity may have occurred, such as has been seen following hypophysectomy, and has been ascribed to depression of the anterior pituitary secretions Insulin tolerance tests were not made and should have proved helpful in establishing this point Another possibility is that the tolerance to glucose increased rapidly to a point at which the usual daily insulin dose became excessive, and the rapid accumulation of long-acting insulin in the body might have produced a hypoglycemic state Here, also, additional studies, particularly sugar tolerance curves, should have been of value Further and more detailed investigations along these lines are indicated

Summary

1 Seven patients were selected in whom diabetes had either been present before the menopause or had been aggravated by it They were selected because the diet and insulin requirements had remained unchanged for five months or more and because all were continuously confined in a hospital during the entire control and test period

2 Estrogenic hormone was given in doses of 6,000 rat units, intramuscularly twice weekly for a period of three months, during which weekly blood sugar estimations were made

3 In four of the seven patients, a reduction in daily insulin requirement of 25 to 50 per cent resulted, and no increase has been necessary for two months, to date, following cessation of this therapy

4 An almost precipitous fall in blood sugar occurred in six of the seven cases, at the end of four weeks in five cases and at the seventh week in one The explanation for this phenomenon may be sought in an increase in insulin sensitivity or in an increased tolerance to sugar

5 In all patients, administration of estrogenic hormone produced a remarkable feeling of well-being, with uterine bleeding occurring in only one case

6 Estrogenic hormone is effective in decreasing the severity of diabetes in postmenopausal patients to a moderate degree The actual value of this form of therapy as an adjunct or substitute for insulin therapy in individual cases can only be determined by such experiments as ours, repeated many more times, and perhaps, by such means, more accurate selection can be made of the type of patient who would benefit most

References

1 Young F G Lancet 2 372 (1937)
2 *Idem* Brit. M J 2 897 (1941)
3 White P Arch Int. Med. 63 38 (Jan) 1939
4 Rocca F F and Perez D Arch. Urug de med Cir y especialid. 26 1 (Jan) 1945
5 Zondek, B Lancet 1 10 (1930)
6 Zeckwer I T Science 100 123 (Aug 11) 1944
7 Segaloff A and Dunning W F Endocrinology 36: 238 (1945)
8 Foster C L J Endocrin 3 79 (1942)
9 Spark C J Clin Endocrin 3 367 (1943)
10 Tuttle E New York State J Med 37 636 (Apr) 1937
11 Barnes B O Regan, J F and Nelson W O J A M A 101 926 (Sept 16) 1933
12 Spiegelman A R. Am. J M Sc 200 228 (1940)
13 Gerber P Pennsylvania M J 49 744 (Apr) 1946

THE USE OF A NEW ANTIHISTAMINIC COMBINATION IN THE TREATMENT OF ALLERGIC DISORDERS

EARL B BROWN, M D and FREDERICK W BROWN M D, New York City

IT HAS been generally accepted that histamine or a histamine-like substance plays some part in the allergic reactions in hay fever and allied disorders [1] Recently, attempts to control many allergic symptoms by the use of an antihistaminic drug have been successful There is no doubt about the value of diphenhydramine hydrochloride as an adjunct in the therapy of this group of disorders

The experimental evidence for listing diphenhydramine as an antihistaminic has been presented and reviewed adequately by others and it is unnecessary to review that work here.[2 3] The use of the drug clinically has been reported previously by O Leary and Farber, Levin Koelsche *et al.*, Thacker, Waldbott, Schwartz and Levin and Farmer and Spitzchen, with results varying from 73 5 to 41 6 per cent improvement [4–16]

Aminophylline has proved to be a very effective therapeutic agent in bronchial asthma when administered intravenously and by rectal suppository [11–13] Oral therapy has been ineffective except in some mild chronic cases, this is probably due to the fact that its dosage must be limited, since large doses are likely to cause considerable gastric irritation [12]

Previous reports of the use of diphenhydramine hydrochloride (Benadryl) in therapeutic doses indicate that side effects occur in from 30 to 67 per cent of patients receiving the drug, the principal disturbances being dizziness and drowsiness [7 9] In an effort to overcome these side reactions, it was decided to try a chemical combination of diphenhydramine and aminophylline (Hydryllin)

achieved by others using diphenhydramine hydrochloride alone

All patients were instructed to use one tablet three to four times daily If no relief and no severe side effects occurred, this dosage was increased to two tablets three to four times daily

In order to evaluate further the usefulness of this drug, the report is broken down into time units as shown in Table 1 The patient was told to take the drug after meals except when the dosage was four times per day, depending upon the duration of the relief The drug was not used in higher doses than eight tablets daily

In a statistical study based upon subjective symptoms there is a great deal of error However, analysis of the time relationship of onset and duration of relief following the ingestion of the drug gave us some idea of the effectiveness of the drug in each individual case The relief percentages are arbitrary figures except for the 100 per cent The 75 per cent group includes those patients who obtained almost, but not complete, relief or who stated that they had better than 50 per cent relief The 20 per cent group includes those patients who thought they obtained only a little relief Unfortunately, all patients were not observant or interested enough to report on the time of onset of relief or duration of relief While the amount of relief these patients obtained was tabulated, the time unit studies were not included for them

Concomitant pollen surveys as suggested by Chobot were not integrated with the reports given in Table 1 [14] However on days when there was obviously no pollen in the air i e, rainy days a patient was asked to continue to take the medication so that a proper evaluation of symptoms could be tabulated

TABLE 1.—RELIEF OBTAINED IN 121 PATIENTS TREATED WITH DIPHENHYDRAMINE HYDROCHLORIDE

Symptom	Number of Patients	Relief Obtained 100%	75%	50%	20%	0	Onset of Time of Relief (in Minutes) 15	15 to 30	30 to 60	Over 60	Duration of Relief (in Minutes) 15	15 to 30	30 to 60	Over 60
Hay fever	81	39	12	11	5	14	13	16	18	7	3	8	26	15
Asthma (perennial)	18	9	5	3	0	1	0	5	3	0	0	0	5	7
Asthma (pollen)	16	8	2	0	3	5	2	3	3	1	2	0	4	3
Vasomotor rhinitis	3	2	0	0	0	1	1	1	0	0	0	0	1	1
Colitis	1	0	0	0	0	1								
Atopic dermatitis		0	0	8	0	2								
Total	121	56	19	22	8	24	16	25	23	8	5	8	36	20

This is a report of 121 patients with allergic disorders treated with this combination of drugs and a comparison of our results with those

All patients studied, 97, or 80 per cent reported improvement which compares favorably with the best over-all figures obtained for diphenhydramine hydrochloride, namely, 73 5 per cent [16] The major difference between our results

This survey was done under the auspices of the Committee on Therapy American Academy of Allergy

The Hydryllin was furnished through the courtesy of G D Searle and Company Chicago Illinois

and previous reports appears to be in the relief of pollen and infectious asthma A combined total of 25 out of 34, or 82 per cent, were improved, which is considerably higher than that reported by other investigators [4–10] Following this study, a group of chronic asthmatics were put on Hydryllin and appeared to obtain excellent relief from their symptoms However, as any change of therapy in a patient suffering from a chronic disease is liable to produce dramatic results, we thought that our period of observation of this group on Hydryllin was too short to warrant proper evaluation Therefore, they were not included in the observations It is our opinion, however, that Hydryllin is much superior to either diphenhydramine hydrochloride or tripelennamine in adult asthmatics and just as effective in children as those two drugs

The toxic reactions were varied and are listed in Table 2

TABLE 2 —Toxic Reactions

Symptoms	Number of Patients
Drowsiness	27
Nausea heartburn or cramps	5
Shakiness	2
Dizziness	2
Drowsiness accompanied by gastrointestinal symptoms	3
Excessive dryness	1
Wheezing	1
Spasm of salivary duct	1

Forty-two of the 121, or 35 per cent, complained of side reactions Thirty-two of these (26 per cent) complained of drowsiness or dizziness Only 21 patients had to discontinue use of the drug entirely because of the side effects Waldbott reports that out of 165 patients observed, 90 (55 8 per cent) suffered from side reactions [8] Of these, 81 patients complained of dizziness or drowsiness Levin mentioned many other side effects but stated that out of 223 patients, 144, or 64 6 per cent, noted drowsiness, Koelsche stated that out of 83 patients, 25 (30 per cent) noted drowsiness [5 6] From these figures it can be noted that the addition of aminophylline to the diphenhydramine hydrochloride has undoubtedly cut down on the amount of drowsiness repeatedly reported by other authors However, when the above reports were made, the unit dosage of Benadryl was 50 mg rather than 25 mg as in Hydryllin It has not been proved whether the use of the 25-mg dose would have been just as efficacious, as well as less toxic, as the higher dose We have also combined 50 mg of diphenhydramine hydrochloride with 5 mg of amphetamine sulfate to combat the drowsiness, but it is our opinion that this combination was not as effective

Summary

1 The effects of a new chemical combination of aminophylline with diphenhydramine (Hydryllin) are reviewed in 121 cases

2 Ninety-seven patients out of the total, or 80 per cent, showed definite improvement with one to two tablets, three to four times per day The most striking improvement, as compared to diphenhydramine hydrochloride alone, was in the adult asthmatics, who showed 82 per cent improvement

3 The side effects were notably reduced with this drug as compared with diphenhydramine hydrochloride alone

39 West 55th Street

References

1 Dale H. H. and Laidlow P P J Physiol 41 318 (1930)
2 Lowe E R. Kaiser M E and Moore V J Pharmacol & Exper Therap 83 120 (Feb) 1945
3 Lowe E R. and Kaiser, M. E Proc. Soc Exper Biol & Med. 58 235 (Mar) 1945
4 O Leary P A. and Farber E M Proc Staff Meet Mayo Clin. 21 295 (Aug 7) 1946
5 Levin S. J J Allergy 17 145 (May) 1946
6 Koelsche G A Prichman L. E. and Carryer H M J Allergy 17 151 (May) 1946
7 Thacker E. A. Arch. Otolaryng 43 597 (June) 1946
8 Waldbott G L J Allergy 17 142 (May) 1946
9 Schwartz E. and Levin L. New York State J Med 46 1233 (June) 1946
10 Farmer L. and Spiehschen, H New York State J Med 47 1119 (May 15) 1947
11 Brown G T J Allergy 10 64 (Nov) 1938
12 Goodman L and Gilman A The Pharmacological Basis of Therapeutics A Textbook of Pharmacology Toxicology and Therapeutics for Physicians and Medical Students New York Macmillan Co 1941
13 Prigal S. J Fuch. A M and Schulman P M J Allergy 17 172 (May) 1946
14 Chobot Robert J Allergy 18 323 (1947)

COURSE OF INFANTILE PARALYSIS TO BE CHANGED BY EXPERIMENT

Start of a five-year experiment that may change the whole course of treatment for persons with infantile paralysis and other disabling diseases has been announced by the National Foundation for Infantile Paralysis The experiment is to be carried on with a March of Dimes grant of $20,000 a year at the Orthopedic Hospital at Los Angeles under supervision of Dr Charles L Lowman, chief of staff emeritus at that hospital The study will center on the theory that patients with infantile paralysis or allied diseases should be treated mentally, emotionally, socially, educationally, and vocationally at the same time they are undergoing medical treatment.—*New York Times, January 29, 1948*

DEVICES FOR THE RAPID RECORDING OF THE UNIPOLAR ELECTROCARDIOGRAM

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THE MODERN trend in electrocardiography which promises to advance the science most is tailoring the electrocardiogram to the particular need of the patient. Thus although the majority of patients can be studied adequately with the standard four lead electrocardiogram, there is a substantial number who require special leads, physically closer to a particular chamber of the heart and hence more revealing

Many such accessory leads have been suggested in the past fifteen years and a number of investigators including the authors are in the process of studying the proposed leads comparing the relative values so as to determine which are so informative that they justify inclusion in routine electrocardiography [1] Although our data in this comparative study is far from complete one is able to say that the multiple chest leads and unipolar limb leads have already proved themselves so useful that they deserve wide adoption in routine electrocardiography

Perhaps the greatest obstacle to the wider employment of these accessory leads is the extra time spent recording them Geiger and Goerner speeded up the recording of the six chest leads materially by using an elastic belt which obviated the necessity of individual placement of the electrodes on the chest [2] To obtain still greater speed and simplicity in operation, we have incorporated a modification of the belt into a special apparatus designed to record rapidly, besides the conventional leads six chest leads and the three augmented unipolar limb leads.* This apparatus has proved itself so satisfactory and time-saving that we consider it well worthwhile to give the details of the devices and the technic used

Technic

Figure 1 shows the switch box interposed between the patient and electrocardiograph which accomplishes the rapid recording of the desired 12 leads without moving wires or electrodes An 11 wire cable (Fig 2) coming from the patient is plugged into the switch box One wire comes from each extremity a fifth wire is connected to the exploring electrode (marked "C" for chest) and six wires from the six electrodes on the elastic precordial belt to be described later In order to prevent external interference which makes for an unsteady base line and wandering of the tracing great pains have been taken to shield the cable and switch box completely and to provide a suitable ground for each of the leads taken Thus, when the right and left arms are used in taking the standard lead 1, the electrical connections in the switch box are such that the left leg acts as ground in taking lead 2 the left arm is grounded, and in lead 3 the right arm is grounded The other nine leads taken are all unipolar leads (Wilson) with the right and left arms and the left leg all connected through equal resistances to form the

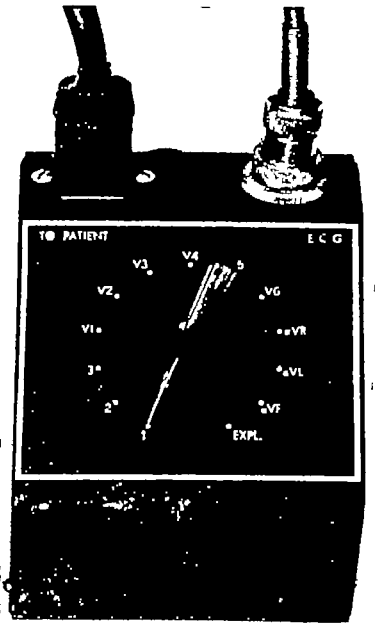


FIG 1 Selector switch

*Made by Medical Designs, 612 Eastern Parkway Brooklyn, New York.

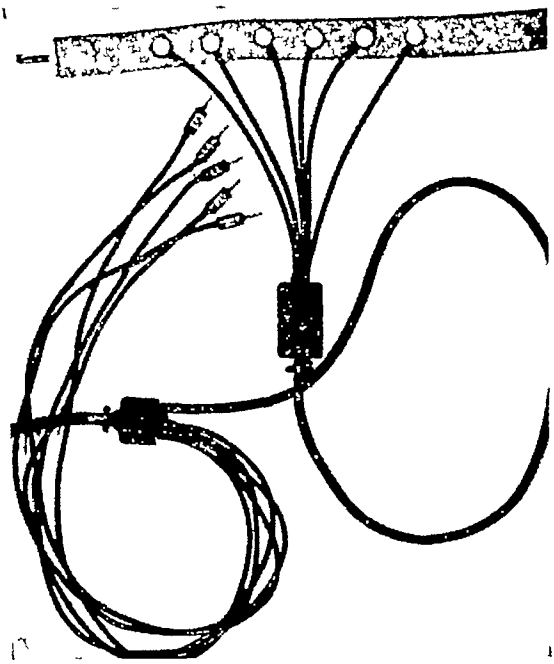


FIG 2 Six-electrode precordial belt and 11-wire patient's cable

indifferent electrode, the terminal of zero potential [3] In these leads the right leg acts as ground If it is desirable in any particular case to explore any point outside of the nine taken as the standard points above, one uses the lead marked "C" From the switch box a three-wire, shielded cable, marked ECG in Fig 1, runs to the input plug of the electrocardiograph All manipulations for the selection of the leads are made at the switch box, the electrocardiograph always recording the selected lead on the lead 2 (right arm-left leg) setting

To facilitate the rapid recording of the chest leads from six positions on the precordium we use a modification of the elastic rubber belt described by Geiger and Goerner [2] It is made of high quality, uniformly thick rubber, one inch wide and 42 inches long Six, round German silver disk electrodes, one inch in diameter, are spaced one and a half inches apart toward one end of the belt From each electrode a wire runs to join the other five wires of the patient's cable which plugs into the switch box (Fig 1, marked "To Patient") A hook on the free end of the rubber belt fits into the proper hole, permitting easy adjustment of the elastic belt to the size of the chest The only precordial placements which need be determined are electrode one (right edge of sternum in fourth interspace) and electrode six (midaxillary line in the fifth interspace) These two points are easily located by the average technician The other four electrodes lie automatically at equal distances from one to six

If the amplifier type of electrocardiograph is used, only a thin layer of electrode paste need be applied to the electrode, and no further rubbing of the skin is necessary With the string machine the electrodes may need more electrode paste or rubbing up and down to reduce skin resistance, especially on hairy chests If failure of the belt to exert sufficient pressure against any of the disks causes wandering of the tracing, the patient is instructed to press the disk firmly against the chest through a dry towel The female breast offers no difficulty in this technic, for the breasts are always lifted and the belt is set into position beneath the axillary folds A typical 12-lead electrocardiogram taken with the above described apparatus and technic is shown in Fig 3

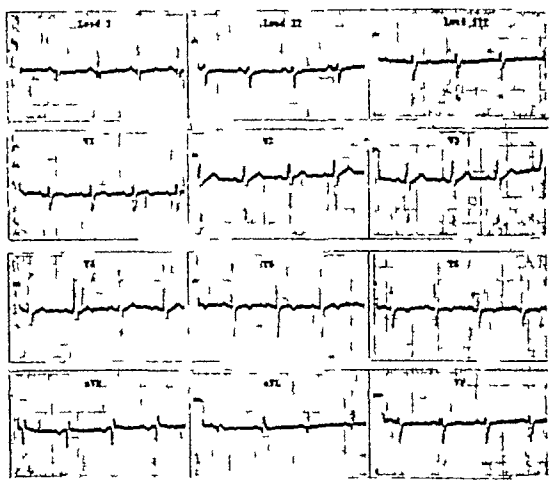


FIG 3 Twelve-lead electrocardiogram

Discussion

The 12 leads which have been selected as the most informative and easily obtained leads in any complete study of the heart are eminently practical With the devices and the technic outlined above it is possible to take the 12-lead electrocardiogram in just a little more time than the ordinary four-lead tracings The use of the precordial belt for taking the multiple chest leads permits great speed in taking these chest leads, once the technic of applying the belt to different chests is mastered Geiger and Goerner showed that there are insignificant differences between records obtained by the belt technic and the six individual precordial placements advocated by the American Heart Association [2-4 5] They stress the fact that with the belt the fixed relation of the electrode to the thorax rather than the heart is sounder theoretically than the standard method, especially in study of axis deviation, ventricular hypertrophy, bundle branch block, etc

Our studies verify these findings We were able to duplicate results better with the belt technic than with individual placements on the precordium, whether this is done by technicians or by the authors themselves The method is, therefore, particularly suited to exercise tolerance tests Since the patient is exercised with the belt in position, a true tracing from the same six precordial areas before and after exercise can be obtained

We hardly need justify the inclusion of the augmented unipolar limb leads of Wilson (aVR, aVL, aVF) in the 12-lead electrocardiogram for complete routine cardiac investigations, for they have already proved themselves of great value in the study of axis deviation, Q-wave abnormalities, right ventricular hypertrophy bundle branch block, and abnormalities of the RS-T segment and T waves [3 4] The devices and technics described above permit the exploration of any part of the body (by use of switch position marked "Expl."), and of nine placements in particular (six precordial, three limbs) It thus appears to answer the growing demand for the unipolar (exploratory) type of electrocardiogram

Summary

A technic for the rapid recordings of a 12-lead electrocardiogram is described An 11-wire cable runs from the patient to a selector switch six of these wires being attached to electrodes in an elastic precordial belt By use of the selector switch the three conventional leads six precordial leads taken with the Wilson terminal as the indifferent electrode and the three Wilson augmented unipolar limb leads are taken in rapid succession without having to move any wires or electrodes It is hoped that the widespread use of these time-saving devices—the switch box, elastic precordial belt, and 11 wire patient's cable—will rapidly build up a mass of data to help establish the norms and standards for these promising accessory leads.

The technic is particularly suited to the special study of axis deviation, Q-wave abnormalities right ventricular hypertrophy, bundle branch block, RST segment and T wave abnormalities. It answers the growing demand for the unipolar electrocardiogram

References

1 Lieberson, L. and Goldbloom A. A.: J Lab. & Clin. Med. 33 118 (1048)
2. Geiger A. J and Goerner J R. Am. Heart J 32 103 (1940)
3 Wilson, I N., Johnston, F D., MacLeod A G and Barker, P S Am. Heart J 9: 447 (1943)
4. American Heart Association Am. Heart J 15: 107 (1938)
5. *Idem.* Am. Heart J 25: 535 (1943)
6. Goldberger E.: Unipolar Lead Electrocardiography Philadelphia, Lea & Febiger 1947

IT'S A MEASLES YEAR

Dr Harry S Mustard New York City Commissioner of Health has asked us to point out that so far during 1948 there have been 9 295 cases of measles resulting in seven deaths in the city

Inasmuch as the highest mortality and the largest number of complications occur in very young children Dr Mustard urges that gamma globulin be administered to all children between six months and five years of age who are household contacts to measles.

Gamma globulin is supplied free of charge by the Department of Health and may be secured at any of the health centers and also at the headquarters building 125 Worth Street, New York City This preparation is available in 2 cc. vials and should be given within six days of the onset of the disease In very young children this dose entirely protects the child and in older children if the disease is not prevented, a mild case occurs in most instances.

The immunity conferred by gamma globulin lasts about three weeks.—*New York Medicine May 5 1948*

STREPTOMYCIN AND SURGERY IN THE TREATMENT OF TUBERCULOUS JOINTS

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STREPTOMYCIN hydrochloride as an adjunct to the surgery of bone tuberculosis has given favorable results in a series of 12 cases Tuberculosis of the shoulder and hip was treated with surgery and streptomycin hydrochloride, and these cases are presented as a preliminary report

The authors believe that the rapid recovery, not only from the general toxic and debilitating symptoms but also from the local subjective and objective pathologic findings, may be attributed to streptomycin, used in conjunction with surgery, as the active element in this recovery

Case Reports

Case 1 —A 44-year-old seaman from Puerto Rico spent his early years in a rural environment He drank pasteurized milk for the first time in New York in 1941 He was one of 14 siblings, seven of which were accidentally killed The remainder are living and well His father died at 97, of old age His mother died at 88, following an operation He had the childhood diseases, including small pox, without sequelae He had enjoyed very good health up to the present illness

In the summer of 1944, following a return voyage from Italy, he developed multiple draining abscesses over the sternum and entire right shoulder girdle He was treated at a New York City hospital with "shots" for the sinuses, however, they did not disappear until several months following his discharge from that institution in November, 1945 Three months later, on January 7, 1946, while on the high seas, he fell across a rope, landing on his right shoulder Immediately, his shoulder became swollen to twice its normal size There was an area of marked tenderness in the region of the subdeltoid bursa for several days The shoulder was particularly painful at night Within a week many purulent sinuses with foul pus appeared over the entire scapular area and axilla, the pectoral region, and the supra- and infraclavicular areas extending over the sternum

He was admitted to the surgical service of Marine Hospital on January 30, 1946 There were multiple draining sinuses about the right shoulder He suffered loss of appetite, general malaise, and listlessness The remainder of the admission history was not remarkable

Pertinent physical findings on January 30, 1946, were as follows Blood pressure, 115/78, pulse, 82, respiration, 18, and temperature averaging 37 5 C The general physical condition was good with the exception of pale oral mucous membranes, glistening sclera, and a chronically infected right shoulder with less than 10 per cent normal range of motion at the scapulohumeral articulation

Roentgenograms of the lungs showed a mild, healed, pulmonary fibrosis of the left apex Roentgenograms of the right shoulder were described as follows There is some rather old periosteal new bone formation of the greater tuberosity of the humerus and a chronic subdeltoid bursitis with some involvement of the supraspinatus tendon, since the soft tissue shadow is particularly dense in the region just above the humerus

During the six weeks in the hospital the patient slowly improved under hot compresses and sulfadiazine The diagnosis was not confirmed in the laboratory However, clinically, he was considered to have bone and joint tuberculosis The patient requested his discharge and returned to sea for the summer months

In January, 1947, he returned to the outpatient department, stating that his shoulder had drained most of the past year and that he had had an incision and drainage at another New York City hospital on October 14 and 19, 1946, and on January 16 and again on January 26, 1947 He stated further that in November, 1946, he was also treated for a "fused kidney with a double ureter" with shots of penicillin

He returned as an outpatient to this hospital the early part of February, 1947 (Fig 1) Cultures, guinea pig inoculation, and smears were taken from the pus and returned positive for tuberculosis, and he was referred to the orthopedic service on April 2, 1947 On April 5, 1947, he developed an acute appendicitis, and an appendectomy was done and the abdomen explored The anomalies of the kidney and ureters were seen, and some fairly large abdominal mesenteric nodes were noted The appendix was acutely inflamed

After an uneventful course following appendectomy, on April 29, 1947, an intra-articular arthrodesis of the right shoulder was carried out The physical findings preoperatively were essentially the same as previously described, except that the right shoulder now had three anterior scars and seventeen openings about the shoulder area, draining moist purulent material, foul in odor The shoulder was twice its normal size, painful on motion and severely painful at night Temperature was 36 C with afternoon rises to 38 2 C He appeared toxic, discouraged, and weak

Laboratory findings were essentially normal except for roentgenographic increase of destruction in the proximal end of the humerus and glenoid fossa Complete blood count showed 4,100,000 red blood cells with 12 Gm per cent hemoglobin, 11,000 white cells with 28 per cent lymphocytes and 72 per cent neutrophils The sedimentation rate was 28 mm. per hour He now weighed approximately 30 pounds less than one year previously



FIG 1 Tuberculous destruction shoulder joint.

In considering the approach to treatment in this case it was decided that an intensive chemical therapeutic regime would be instituted using streptomycin as an adjunct to surgery Although Hinshaw in his report on four cases of bone tuberculosis makes little mention of its use we feel that streptomycin most certainly should be used in conjunction with established orthopedic procedures [1]

Streptomycin was given intramuscularly in 1/2 Gm. doses every three hours for three days preoperatively This dosage was continued for three more days postoperatively Then the dosage was reduced to 300 000 units every three hours up to 90 Gm. No other bactericidal drug was given One-quarter grain doses of morphine sulfate were given every four hours for one and a half days for postoperative pain and multivitamins were continued throughout the period of hospitalization

On April 29 1947 the operative procedure consisted of a primary debridement of the scapulohumeral articulation The head of the humerus and glenoid labrum was devoided of all tuberculous tissues including cartilage and the joint was fixed at 130 degrees abduction with Steinman pin fixation The Putti method of extra-articular arthrodesis was then carried out by a subperiosteal exposure of the entire spine of the scapula. An osteotomy of the base of the spine from the body of the scapula was performed. The acromioclavicular articulation was spared The spine of the scapula was detached from its base denuded of periosteal tissues The acromion was inserted into an osseous flap approximately 1 1/2 inches in width and 1 inch in depth which included the cortex raised upon the shaft of the humerus with the base of the flap distal The extremity was immobilized in an abduction plaster cast.

By the eighth postoperative day, all the sinuses about the shoulder had stopped draining, and the skin wound had healed cleanly Further, a previously thick bulky shoulder had returned to normal size and the patient was cheerful, hungry, and stated that he felt much better than he had for the past year By the end of the sixth week, he had gained 25 pounds, and it was necessary to change the body part of his shoulder spica

By the end of the eighth week, roentgenogram showed a fusion of the affected joint, however the cast was continued for another month Complications of the streptomycin therapy consisted of pain at the site of injection (with or without novocaine) burning during the last week of injection and, occasionally vertigo on sudden change of position At the end of three months the patient had gained 32 pounds. Night pains in the shoulder subsided after the second postoperative night. The Steinman pin inserted into the scapulohumeral articulation was removed at the end of the sixth week. There was no further drainage from the shoulder or chest (Fig 2) The pathologic report of the specimen removed from the shoulder was positive for tuberculosis The patient's temperature returned to normal at the end of the eighth day

At the end of the fourth month postoperatively the patient was found to have a painless, stable and satisfactorily functioning arthrodesis of the right shoulder (Fig 3) He returned to his duties as a

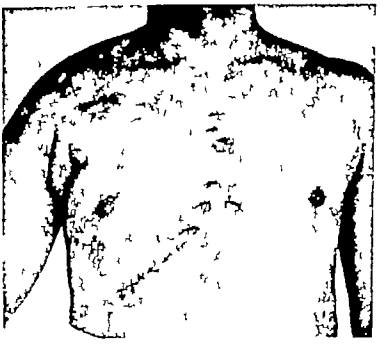


FIG 2. Healed scars from draining sinuses anterior view



FIG 3 Arthrodesis of the tuberculous shoulder joint

seaman On re-examination seven months after surgery, the shoulder was found to be asymptomatic, and the patient was in excellent health

Case 2 —A 41-year-old Norwegian seaman whose illness dated back to 1938, at which time following a severe cold he lost his voice, was hospitalized, and a diagnosis of pulmonary and laryngeal tuberculosis was made. Following hospitalization of twenty months at the Charleston Marine Hospital in South Carolina, he was discharged as an arrested tubercular and returned to duty until July of 1945

In December of 1945, there was an onset of dull aching pain in the region of the left hip which was more pronounced during the night and particularly in bad weather Associated with this, he had a severe left sciatica, transient in type, and superimposed on this, several attacks of "herpes" on the affected side, lasting usually for a period of three to seven days at a time After the fifth or sixth attack he was hospitalized at the U S Marine Hospital at Martha's Vineyard, Massachusetts, in January of 1945 On February 10, 1945, he was transferred to this hospital with a diagnosis of pulmonary tuberculosis and tuberculosis of the left hip joint At that time he had a dry cough, weight loss, and marked swelling and pain in the region of the left hip

Pertinent physical findings in February, 1945, were as follows a 41-year-old man, weighed approximately 120 pounds, normal weight being about 135 pounds The blood pressure was 110/70 He appeared anemic and weak with his left hip swollen twice the normal size. The patient had a definite limp with a peroneal type of foot drop and atrophy of the lower thigh and calf on the left side He had a generalized adenopathy particularly pronounced in the neck and inguinal regions, there were definite pains on motion of the left hip and a moderate amount of edema in the region of the left ankle joint His speech was coarse and whispered

His physical status remained essentially the same until June of 1946, at which time the right hip became involved mildly On June 12, 1945, a right hip spica was applied In spite of the immobilization in the cast, a flattening of the head occurred with increased pain in the articulation (Fig 4)

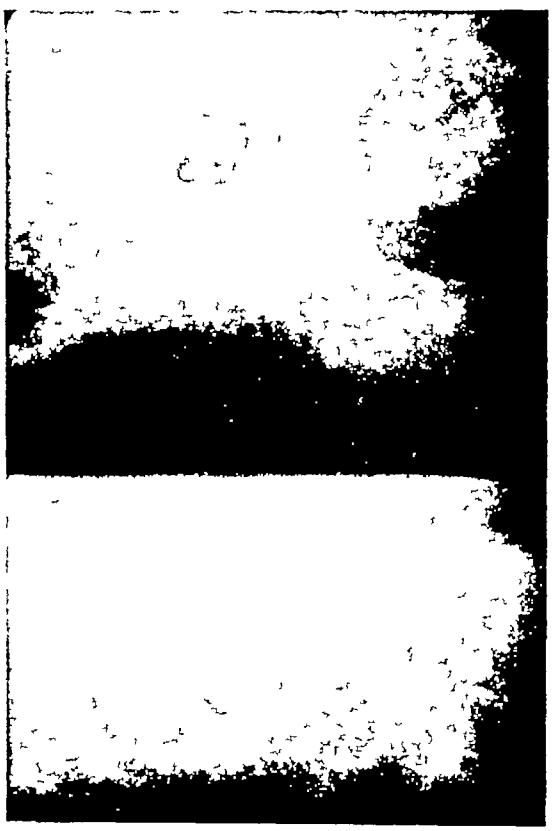


FIG 4 Flattening of the head, with destruction of the joint

On August 15, 1946, a primary joint debridement with denudation of all tuberculous tissue and joint cartilage of the head of the femur and the acetabulum was carried out on the left hip A Smith-Peterson nail fixation of the head into the acetabulum in a position of election was performed On February 6, 1947, the Smith-Peterson pin was removed, and there was a persistence of a sinus tract in the region of the left groin In spite of the apparent beginning arthrodesis of the articulation, the drainage continued On June 18, 1947, streptomycin was instituted utilizing 1/. Gm every three hours for a period of ten days After forty-eight hours drainage ceased

Positive sputum was first noted in July of 1945 and lasted until June of 1946 All smears of his hip drainage were negative However, the guinea-pig inoculation was positive in September, 1946, and

again on August 15 1946 The pathologist s report at that time (August 15 1946) was "amorphous calcific masses and necrotic bone no tubercles were seen" In December, 1946 left hip smear was positive for tuberculosis and also for Bacterium coli

Roentgenograms taken in June 1945 were reported as follows The findings of the hip are consistent with tuberculosis of long standing Those of the lungs are interpreted as far-advanced fibro-exudative type of pulmonary tuberculosis with a 2-cm cavity anteriorly in the right chest below the first rib In September, 1945 the pulmonary condition was described as more fibroid with the same cavity still present. In October 1945 films showed a progression of the left femur pathology of the previously described arthritis of the joint and increase in obliteration of the space with extensive decalcification of the femoral shaft It was felt that ankylosis was present roentgenologically The dorsolumbar spine was not remarkable for bone or joint pathology however there was an abnormal increase of the soft tissue density adjacent to the anterior margin of the fifth lumbar vertebra and first sacral segment.

By July 15 1946 the bone destruction had progressed so that films showed soft tissue calcification about the left hip joint and almost complete destruction of the articulating surfaces of both the acetabulum and the femur The leg appeared shortened by at least ½ inch Chest films were constant Postoperative films on August 19 1946 (Fig 5) revealed the shelf iliac graft held in place by a screw with a Smith Peterson nail stabilizing the hip Many bone chips were seen and much of previously described calcified tissue removed.

On November 19 1946 films revealed definite callus through the joint, also callus about the bony bridge. The fusion appeared to be solid particularly in the inferior part of the joint In January 1947 roentgenograms of the left hip exhibited solid bony ankylosis of the hip and the stabilizing bony bridge from the crest of the ilium There was no activity or bone destruction noted In chest films taken in May, 1947 there was considerable clearing of both lung fields, and marked improvement was the impression.

The patient was re-examined in November 1947 He is convalescing following a pulmonary lobectomy His general physical condition is excellent The left hip is stabile painless, and ankylosed in good position for function The area of sinus drainage appears normal.



FIG 5 Arthrodesis of the hip joint with shelf

Summary

The authors believe that the striking results obtained in the short period of time in these cases were directly attributable to the effects of streptomycin The clinical and roentgenographic fusion time which is usually from eight to ten months in the shoulder was reduced to three months, and in the case of the hip as soon as streptomycin was administered The multiple draining sinuses have completely disappeared Fusion was demonstrated on roentgenograms and clinically the shoulder and hip joint were solid painless and in excellent position

It was further believed on the other hand, that the patients would not have had the rapid recovery from streptomycin alone with conservative treatment if they had not had a complete joint toilet ' with an intra and extra-articular arthrodesis carried out.

Reference

1 Hinshaw H. C.: Am. J 21 429 (May) 1947

INDUSTRIAL PSYCHIATRIC FELLOWSHIP

A pioneer program to train psychiatrists for the industrial relations and labor field will be inaugurated at Cornell University with an industrial psychiatry fellowship offered in the School of Industrial and Labor Relations. The Carnegie Corporation has made a supporting grant. The fellowship will be awarded to a physician with experience in psychiatry and will provide two years of training at the school. In addition to classroom study in basic industrial and labor relations courses the fellow will receive training in human relations work in a plant, labor union, or government office

A CLINICAL EVALUATION OF NEO-ANTERGAN AND ANTISTINE IN THE TREATMENT OF RAGWEED HAY FEVER

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THE phenomenon of desensitization in anaphylaxis is defined as the refractory state produced by frequent small injections of a specific antigen From the beginning of the demonstration of specific desensitization in anaphylaxis and allergy, many workers began to turn their attention to a method which would inhibit anaphylaxis or allergy without the use of a specific antigen

According to the theory advanced by Sir Thomas Lewis and the work of Lewis and Grant and Lewis and Harmer, it is assumed that the physiologic response in anaphylaxis and in allergy is due to the union of antigen and antibody in the shock tissues, with the resulting liberation of a histamine-like substance, now regarded by most workers as being histamine itself [1-4] In 1910, Dale and Laidlaw described the close resemblance between histamine shock and anaphylactic shock in guinea pigs [5 6] More and more evidence has accumulated to support the histamine theory of allergic manifestations The writings of Dragstedt and Code lend emphasis to this theory [7 8] Although there is much evidence that histamine release constitutes a potent factor in the production of anaphylactic shock and allergy, there is justification for the assertion that not all manifestations can be explained on the basis of histamine activity This may help to explain, in part, the difficulty of obtaining a nonspecific agent that would act as a common denominator or common factor of all anaphylactic and/or allergic reactions This probably holds true for the newer antihistaminic drugs in which an attempt is made to counteract the effects of the histamine release that occurs from the union of an antigen and antibody Since there is evidence pointing to other factors as yet not entirely understood, not all allergies would be expected to respond to antihistaminic therapy alone However, any attack on the problem of allergy must be pursued to its fullest extent, and any point in the chain of events that occurs in an antibody and antigen reaction into which one can drive a wedge so as to secure even partial relief in a limited number of the allergic diseases should be fully utilized

Practically all the newer drugs that have shown any promise in the treatment of allergic diseases are the so-called antihistaminic agents that compete with the histamine, either by displacement or replacement of the attachment to the cell receptor A systematic search for clinically effective antihistaminic substances was only begun in 1937 French investigators, especially Fourneau and Bovet, experimented on animals with a number of highly potential antihistaminic chemical compounds [9] The most effective was 2-isopropyl-5-methylpenoxyethylamine (929F) Staub investigated another Fourneau compound, N-phenyl-ethyl-N-diethyl ethylynediamine (1571F) [10] Both were shown to alleviate anaphylactic shock and histamine-induced bronchoconstriction and to prevent histamine from contracting intestinal muscles These findings were confirmed by other workers The drawback to these two substances was that they were too toxic In 1943, Halpern described two new compounds [11] One of these was N-diethylamine-ethyl-N-benzyanaline, also known as 2339RP, and the other was Antergan Both compounds were investigated by many European workers These drugs were found to be more effective and less toxic than 929F and 1571F, but they still gave too many toxic reactions Mayer, Huttner, and Scholz investigated several aminopyridal and aminopicoline derivatives related to 1571F [12] They found that one of these, N-dimethylenediamine (pyribenzamine), was the most active antihistaminic and the least toxic An excellent discussion of this drug is contained in the work of Arbesman and his coworkers [13] Leibowitz and his coworkers compared its value in hay fever patients treated with and without specific pollen extract desensitization and also in those patients treated with specific pollen desensitization alone [14] Another comparatively new drug, β-dimethylamine ethyl benzhydryl ether hydrochloride (benadryl) was demonstrated by Loew and his associates to be an efficient antihistaminic of fairly low toxicity [15 16] Reports by Feinberg, Curtis and Owen, O'Leary and Farber, Schwartz and Levin, and numerous other workers showed good results [17-20] Of all of the compounds mentioned above, the more recent ones, pyribenzamine and benadryl, seemed to be the most effective and had the least toxicity However, there were still numerous side reactions encountered with these drugs,

Neo-Antergan was furnished through the courtesy of Merck & Co. Inc Antistine was furnished through the courtesy of Ciba Pharmaceutical Products, Inc

and the search is still on for better antihistaminic drugs with, what is very important, less toxicity

Bovet and his associates recently described a new drug, N P-methylbenzyl N-dimethyl aminoethyl and amidopyridine, or compound 2786RP (Neo-Antergan) [21] This drug was described as more potent and less toxic than Antergan A Swiss anti-allergic histamine antagonist, 2 phenyl benzylaminomethylimidazolene sulfate known as Antistine, is also one of the newer antihistaminic drugs available [22–24] The chemical formulas are as follows N-phenyl N benzyl aminoethyl-imidazolin, Antistine, and N *p*-methoxyl benzyl N - dimethyl aminoethyl aminopyridine Neo-Antergan

In an effort to determine whether these two drugs had greater efficiency and less toxicity and also to determine their value in comparison to the treatment by desensitization, they were selected in the treatment of one type of allergic phenomenon only, namely, the treatment of ragweed hay fever

Material

A series of 134 patients with ragweed hay fever was treated for the 1947 season The pollen count was not regarded as a factor in the evaluation of the symptoms of these cases since the pollen count, locality, and period of time of evaluation were constant for all cases Thus if at any particular time the pollen count was high this was constant for all cases and any difference in the over-all severity of the symptomatology of one group of cases as compared with the others could reasonably be attributed to factors other than the pollen count

The series was divided into three main groups. Group I received only the antihistaminic drugs. Group II received routine preseasonal and coseasonal desensitization with ragweed pollen extract, plus the antihistaminic drugs during the hay fever season and group III received the routine preseasonal and coseasonal treatment with ragweed pollen extract alone In order to eliminate any psychologic factors, group I which received only the antihistaminics, were also given preseasonal and coseasonal injections along with the others, except that the injections consisted of buffered saline, and group III whose treatment consisted of ragweed pollen injections alone, were also given pills during the hay fever season except that the pills were merely placeboes. So from the psychologic point of view all of the three groups received the same treatment injections, and pills

Since we were working with two drugs, groups I and II were further subdivided into group I A and I B and group II A and II B The A groups received Neo-Antergan, and the B groups received Antistine

The cases were chosen at random and placed in the various groups regardless of the routine classification of their skin sensitivities (A, B, or C) The Neo-Antergan was given in doses of 50 mg three times a day and the Antistine in doses of 100 mg three times a day, except in a number of cases where the side reactions made it necessary to cut the dose or, in some cases, to eliminate it entirely Also, some cases which could not tolerate Neo-Antergan were switched to Antistine and vice versa The symptomatic results and toxic reactions were tabulated The types of toxic reactions were also noted Those cases that were classified as obtaining relief had to show an appreciable amount of relief to be so considered The results are shown in Tables 1 to 3

TABLE 1.—RESULTS OF THE TREATMENT OF RAGWEED HAY FEVER PATIENTS WITH NEO-ANTERGAN AND ANTISTINE

	Number of Cases	Relief	No Relief	Percentage Relieved
Group I.—Without Ragweed Desensitization				
Neo-Antergan	27	19	8	70
Antistine	33	15	8	65
Total	50	34	16	67
Group II.—With Ragweed Desensitization				
Neo-Antergan	14	11	3	79
Antistine	20	15	5	75
Total	34	26	8	77
Group III.—Ragweed Desensitization Alone	50	38	12	76
Total All Groups	134	98	36	73

TABLE 2.—TOXIC REACTIONS OF NEO-ANTERGAN AND ANTISTINE IN A GROUP OF HAY FEVER PATIENTS

	Number of Cases Treated	Number Experiencing Side Reactions	Percentage Experiencing Side Reactions
Neo-Antergan	41	15	36
Antistine	43	9	21
Total	84	24	29

TABLE 3.—TOXIC REACTIONS BY SYMPTOMS

Reaction	Neo-Antergan Group	Antistine Group
Sweating	2	0
Nausea	6	3
Dermatitis	11	0
Diarrhea	6	0
Colic	4	0
Dizziness	2	1
Tachycardia	2	2
Pruritis	2	1
Headache	2	1
Drowsiness	1	3
Nervousness	1	0
Pharyngitis	0	1
Vomiting	0	1
Constriction of chest	0	1
Gastritis	1	2

Each of the above 24 patients displaying toxic reactions had one or more of the above symptoms

At no time was there complete relief from either of the two drugs It was temporary, and very rarely was even this temporary relief complete. In about one third of the cases the relief

was intermittent, the patients obtained relief at one period of time and not at another with the same drug, or they might obtain relief at the beginning of the use of the drug and fail to do so later on The other two thirds of the cases obtaining relief did so with fairly regular consistency

Side reactions occurred with these two drugs also, although not with such a high incidence as was reported with some of the other antihistaminics Some of these toxic reactions were severe enough to warrant discontinuing the drug

Summary

A series of 134 patients with ragweed hay fever was divided into three groups One group was treated with antihistaminic drugs alone, the second group with the combination of antihistaminic drug and ragweed pollen desensitization, and the third group with ragweed pollen desensitization alone

Groups I and II were further subdivided into A and B, the A group receiving Neo-Antergan and the B group, Antistine In group I-A there was relief in 70 per cent of the cases and in group I-B there was relief in 65 per cent of the cases, an average of 67 per cent In group II-A there was relief in 79 per cent of the cases and in group II-B, relief in 75 per cent, an average of 77 per cent In group III there was relief in 76 per cent of the cases Toxic reactions occurred in 36 per cent of the cases being given Neo-Antergan and in 21 per cent of those taking Antistine

Conclusions

The two drugs, Neo-Antergan and Antistine, are of value in the treatment of hay fever Neo-Antergan seems to have more antihistaminic properties but at the same time gives more toxic reactions than Antistine

From the drugs alone, results were not as good as could be obtained with the combination of the drug and pollen desensitization There was, however, only a little better result from the use of the drugs and the pollen desensitization than from the use of pollen desensitization alone

Apparently, desensitization treatment is still the method of choice, and the antihistaminic drugs cannot be considered as substitutes However, the drugs are of value as adjuvants in that they help to relieve some of the more severe symptoms and to shorten their duration, even if only temporarily They help some patients who probably would not be relieved as well from desensitization alone We must also never lose sight of the fact that a considerable number of toxic reactions occur We feel that these antihistaminic drugs, if used judiciously, together with the recognized orthodox methods of treating allergic disorders, are of valuable assistance in the doctor's armamentarium

References

1 Lewis T Heart 2 119 (1924)
2 Lewis T and Grant R. T Heart 2 200 (1924)
3 *Idem* Heart 13 219 (1926)
4 Lewis T and Harmer, I M Heart 12 19 (1927)
5 Dale H H and Laidlaw, P P J Physiol 43 182 (1911)
6 *Idem* J Physiol 41 318 (1910)
7 Dragstedt C A and Gebauer Teulnegg C Am J Physiol 102 512 (Nov) 1932
8 Code C F Am. J Physiol 137 78 (Aug.) 1939
9 Fourneau E and Bovet D Arch internat de pharmacodyn et de thérap 46 178 (Oct.) 1933
10 Staub A M Ann Inst. Pasteur 63 400 (Oct) 1939
11 Halpern B N Arch. internat de pharmacodyn et de thérap. 68 339 (1942)
12 Mayer R. L. Huttner C P and Scholz C R Science 102 93 (1945)
13 Arbesman C E Koepf G F and Miller G E J Allergy 17 203 (1946)
14 Leibowitz H Kurtz, I M and Schwartz E New York State J Med 47 989 (1947)
15 Loew, E R. Kaiser M E and Moore V J J Pharmacol Exper Therap 83 120 (1945)
16 *Idem* Proc Soc Exper Biol & Med 58 235 (Mar) 1945.
17 Feinberg S M and Friedlaender S. J Allergy 16 296 (1945)
18. Curtis A. C and Owen B B Univ Hosp Bull Ann Arbor 2.. 25 (1945)
19 O Leary P A. and Farber E M Proc Staff Meet. Mayo Clin 20 249 (1945)
20 Schwartz E and Levin L New York State J Med 46 1233 (1946)
21 Bovet, D , Horelois R and Walthert F Compt. rend Soc de biol 138 99 (1944)
22 Landau S W Clinics 5 467 (Aug.) 1946
23 Skouby A P Nord med tidskr 34 1022 (May) 1947
24 Kallos F Nord. med tidskr 34 1015 (May) 1947

INTERNATIONAL CONFERENCE ON POLIOMYELITIS ANNOUNCED

The National Foundation for Infantile Paralysis of the United States has announced that it will celebrate its tenth anniversary by sponsoring the First International Poliomyelitis Conference, to coordinate and evaluate the last decade of progress that medical science has made in the study of the disease

According to the announcement, it will be the first time that information on poliomyelitis, its treatment and research, has been exchanged internationally on such an extensive basis It is expected that the conference will bring together the world's outstanding laboratory and clinical authorities on poliomyelitis The meeting will be held July 12 to 17, at the Waldorf-Astoria Hotel in New York City

STREPTOMYCIN IN CHRONIC TUBERCULOSIS

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STREPTOMYCIN has a definite bacteriostatic and some bactericidal action on tubercle bacilli in vitro and in vivo During treatment the number of bacilli in the sputum is usually reduced but in chronic tuberculosis only occasionally is the sputum converted to negative This refers to concentrated and cultural examinations Tubercle bacilli in vitro are inhibited by $^1/_2$ to 1 unit of streptomycin

The daily dosage and the optimal duration of treatment are not definitely established In most clinics in which 2 Gm a day were administered last winter, 1 Gm is now the daily dosage One-half gram may be sufficient The 1-Gm daily dose is usually given in two or three portions at eight- to twelve-hour intervals Acute toxic cases hematogenous, miliary or pneumonic have responded to a dosage of 2 Gm a day divided into from two to six doses and maintained for one hundred twenty days [1] The serum level with $^1/_2$ Gm twice a day is about 23 units at one hour after the injection and 4 units after twelve hours With a dosage of $^1/_2$ Gm every eight hours, the blood level is about 14 units at one hour and 5 5 units at eight hours after injection [2] The daily dose intrathecally in tuberculous meningitis is 50 mg or 1 mg per kg of body weight

It does not appear to be necessary to maintain a relatively even level of streptomycin in the blood We do not know how quickly a tubercle bacillus reproduces itself but probably one or two relatively high levels maintained in the blood for a short time during the day are sufficient to exercise a suppressive action on the tubercle bacillus or to interrupt the reproductive cycle of the organism

We do not know how long the treatment should be continued Everyone has observed that when symptoms are quite severe a rapid change for the better occurs within one week e g temperature falls to normal and cough and expectoration are reduced As a rule this is not due to action of streptomycin on secondary organisms The development of bacterial resistance to streptomycin is to some extent related to the duration of continuous treatment This refractoriness when it occurs usually develops at some time after four to six weeks of treatment There is a tendency therefore to reduce the length of a course to four to eight weeks It may even be possible that a course of one week a month continued throughout the year may be a good method in chronic pulmonary tuberculosis.

It is assumed that when the patient's bacilli become resistant to the action of 500 or 1 000 units of streptomycin no further benefit can be expected from continuation of treatment The bacilli which had become resistant may become sensitive again some months later This is rare in the experience of William Steenken [2] The sensitivity of the patient s bacilli should be examined at the end of each month s treatment.

Occasionally patients become allergic to some substance in the streptomycin mixture but this rarely interferes with continuance of treatment. With a daily dose of 1 Gm vertigo is much less common than with the 2-Gm dose. All the effects of a high dose are felt when the kidneys had been previously damaged and cannot excrete the antibiotic as rapidly as is usual This may happen with very little change in the urinalysis. It is necessary therefore to determine the blood level at about the third or fourth day and if it is abnormally high to study the renal function carefully In the Saranac Lake area we have been very fortunate in having the use of the facilities of the Trudeau Sanatorium Laboratory through the courtesy of William Steenken for the determination of blood levels and bacterial sensitivity

Streptomycin should not be used in competition with well-established and indicated treatment such as thoracoplasty and bed rest but it is recommended before and during resection of a lung or a lobe We do not recommend it before the average thoracoplasty operation

The best results of streptomycin treatment as had been forecast occur in the early exudative types of disease This may occur as a fresh and newly-discovered bronchopneumonia or miliary disease or it may manifest itself as a progression from a long-standing chronic disease. There is a large group of patients with chronic fibrosing disease usually with cavity formation. This report concerns some results observed in such patients who have been under streptomycin treatment since the drug first became available to us in November 1946 and whose treatment was terminated at least several months ago These patients were treated at Gabriels Sanatorium and in private sanatoria in Saranac Lake.

In choosing these 27 chronic cases we have excluded patients with chronic disease in whom a recent exacerbation was the indication for ad

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ministering the drug Some of these patients had tuberculous complications, and we were interested in the effect upon that disease and upon the pulmonary disease Many of them had intermittently progressive disease, some of which were very toxic

Of the 27 cases the disease was far advanced in 23 One patient with minimal fibrous disease had chronic bronchial tuberculosis Four patients had moderately advanced disease, one with tuberculous spondylitis, one with chronic tuberculous bronchitis, and one with tuberculous adenitis

The average duration of disease was nine years The disease had been discovered in one patient only one year previously, and ten patients had been sick for ten to twenty years

As to tuberculous complications, five had intestinal tuberculosis, seven laryngitis, five bronchitis, one chest wall sinus, one adenitis, two osseous tuberculosis, one fistula in ano, and one had nephritis

As to the dosage, three patients received 2 Gm a day throughout, 20 received 2 Gm at the beginning and later 1 or 1/2 Gm, and five received 1 Gm daily throughout the course The duration of treatment, especially in our earlier experience, was ten to twenty weeks, with a usual total dosage of 100 to 150 Gm More recently, we gave 42 Gm during six weeks A few of this group had more than one course of treatment

The immediate benefit, frequently in the first [illegible] of treatment, is sometimes very remarkable In this group of patients, the following changes were noted within the first few weeks one, disappearance of dysphagia, one, decreased or absent diarrhea, five, decreased cough and expectoration, two, loss of fever, one, sinus healed, one, fistula in ano healed, three, disappearance of wheezing, two, disappearance of bone pain, one, glands smaller, and two, worse These improvements were the more notable because of the prolonged duration of some of these symptoms

The later results up to date are much less impressive as a whole, but in some individual cases the improvement had been maintained satisfactorily Six patients died In two the bronchial disease healed with some residual stenosis Improvement in the laryngitis was maintained in two patients Of the three cavities which closed, one was kept collapsed with pneumothorax, and one cavity reopened In addition to the six patients who died, 14 more showed no permanent improvement We saw no definite benefit which could be attributed to streptomycin in the three cases of osseous tuberculosis

One of the most impressive effects of streptomycin therapy is reduction in the amount of sputum The decrease was quite definite in ten patients It was surprising to find that the sputum became converted in seven cases, but special features of the disease had some influence In chronic fibroid cavernous disease, intermittently negative sputa are not uncommon In one patient the pulmonary disease was inactive, and the tubercle bacilli had their source from the bronchial disease which was healed by streptomycin

The bacilli of one patient were resistant to 1,000 units of streptomycin before beginning the treatment She obtained no benefit In 12 patients the bacillary sensitivity was preserved In eight patients the bacilli became resistant and were not affected when grown in a medium containing 5 to 1,000 units of streptomycin

Case Reports

Case 1 —An unmarried woman, 29 years old, of Ecuador, came to Saranac Lake in October, 1945 Her pulmonary tuberculosis began in 1939, and she had never taken proper treatment She was thin and weak but without fever She had x-ray evidence of ileocecal tuberculosis Her x-ray showed disease scattered throughout both lungs, more intense in the upper thirds where there was marked fibrosis with cavity formation, and emphysema Slight increases of disease occurred early in 1946 A planigram revealed bronchiectasis, bleb formation, and small cavities in each upper third There was slight improvement up to February, 1947 The sputum was scanty and contained few bacilli The morning cough was prolonged and hard

Streptomycin was begun February 20, 1947, 2 Gm a day in 5 doses for eight days The temperature, which had been normal, rose to 99 6 F, and she developed a slight rash on the back of the hands The dose was reduced to 1 Gm, and a new lot was given The temperature then fell One gram in three doses was given until May 18, a total of 102 Gm in twelve and a half weeks Vertigo became marked after the third week and was slowly compensated for some months after stopping the drug She had a remarkable reduction in the harassing morning cough From March to July, she had two positive concentrated examinations, one of which was negative on culture, and six negative concentrates, of which two were negative on culture X-ray showed very little change for the better

Case 2 —The history of one patient is interesting from the point of view of the difficulty in making a diagnosis if one does not have tuberculosis in mind when the patient has a chronic respiratory condition A 35-year-old woman had a cough for ten years Five years ago, an x-ray revealed a minimal lesion in the right upper lobe which had the appearance of a well-fibrosed, healed lesion I doubt if tubercle bacilli were searched for, at least not re-

peatedly For nine years she had a recurring and later persistent wheeze in the right chest After a lipiodol examination a diagnosis of bronchiectasis was made. She had a number of respiratory infections, some of which were considered to be bronchopneumonia.

Finally, she was sent to Dr Clerf of Philadelphia, in the summer of 1946 and he diagnosed tuberculous bronchitis right upper proved by biopsy When she did not improve with rest treatment she was given streptomycin from February 24 to May 14 1947 2 Gm in 5 doses for one week and then 1 Gm in 3 doses for ten weeks. Also for six weeks she took 1.2 Gm. by aerosol inhalation divided into 4 doses a day The drug by inhalation was irritating and had to be stopped She had a total of 105 Gm. during eleven weeks The wheeze of nine years duration ceased entirely within six weeks it was decreased almost immediately The expectoration was reduced from 10 to 2 cc and became free of tubercle bacilli by concentrate and cultures. Bronchoscopy six weeks after treatment was begun showed healing of the ulcer and restoration of the mucous membrane to normal but the stenosis of the right upper bronchus changed from 4 mm to 7 mm. The well-fibrosed pulmonary lesion was unchanged

Conclusion

Streptomycin is not likely to lead to a complete cure of prolonged chronic pulmonary tuberculosis The more fibrocavernous the disease the less likely is benefit to be expected However, some of the extrapulmonary complications may be relieved or cured Occasionally such an improvement may occur especially in the better lung that the patient may be prepared for some form of collapse therapy In some patients a very satisfactory symptomatic relief may be anticipated and this may continue for at least six months after cessation of antibiotic therapy In a rare case perhaps when bronchial tuberculosis is the most active factor in the disease, a complete cure may occur

References

1 Council on Pharmacy and Chemistry J A M A 135: 634 (Nov 8) 1947
2. Streaker Wm. Jr: Personal communications.

LIVING COSTS RISE FASTER THAN PHYSICIANS FEES

The cost of living has risen more rapidly than the fees charged by physicians for medical services according to Frank G Dickinson Ph D director of the Bureau of Medical Economic Research of the American Medical Association. In his new study entitled Comparative Increases in the Costs of Medical Care and the Costs of Living,' Dr Dickinson stated that the quantity of medical care received by the American people was at least two thirds more in 1946 than in 1939

'When the various indexes and ratios are studied, Dr Dickinson said, "it can be seen that the quantity of medical care received by the American people probably has increased much faster than the increase in the number of physicians. This apparent output per physicians doubtless reflects the increasing use of technical assistants.

'Whether one examines the record of total expenditures of the American people for medical care or the prices of significant items during recent years he comes to the general conclusion that the American people have been fortunate in that the costs of keeping well have not risen as rapidly as the cost of living.

Dr Dickinson estimated that the quantity of physicians' services—one of the medical care items—was approximately one-half greater in 1946 than in the base period 1935–1939 but the number of physicians was only one-seventh greater

Dr Dickinson's newest study is the second made within a year In 1947, he published a study entitled Is Medical Care Expensive? Dr Dickinson said that medical care items as a whole cost the American people $5 600,000,000 in 1946 but that only 3.9 per cent of the total personal consumer expenditures of the American people were spent for these medical care items. This compared with 4.3 per cent in 1940

He also found in his first study that in 1946 physicians received only 26 per cent of all the dollars spent for medical care as compared with 31 per cent in the base period 1935–1939 and 32 per cent in 1929 the first year for which the data were gathered and published by the U.S Department of Commerce.

On the other hand, he found that the amount spent for drugs in 1946 had risen to 24 per cent of all dollars spent for medical care as compared with only 21 per cent in the base period, 1935–1939 20 per cent in 1929

GANGRENE OF BOTH LEGS FOLLOWING FEMORAL VEIN LIGATION

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CERTAIN therapeutic agents or procedures are so positive in their action that when first presented they are accepted without question This applies to such drugs as salvarsan, insulin, sulfonamides, penicillin, thiouracil, and likewise to surgical procedures which have been made possible of late because of the improvement in pre- and postoperative care, aided by antibiotics, blood transfusions, and especially the more modern methods of anesthesia, as applied to thoracic surgery

One of the operative procedures which has become very popular in a short time is that of femoral vein ligation This applies especially to the prevention and treatment of embolic processes that may occur in coronary disease, thrombophlebitis, or phlebothrombosis Femoral vein ligation for the above conditions is being abandoned by some of those who were former enthusiasts Femoral vein interruption is now accepted as being of therapeutic value in chronic, progressive arterial occlusion in conditions such as Raynaud's disease, arteriosclerosis, etc The physiologic mechanism of the circulation lends support to such a procedure The blood pressure in the large arteries drops to 32 mm of mercury in the arteriolar bed and to approximately 22 mm in the arterial capillaries, and 12 mm in the venous capillaries The venous return to the heart is aided by this vis a tergo, by the action of the muscular contraction, and by the suction created by the negative pressure of the chest during inspiration which helps to draw the venous blood from the vena cava into the right auricle

When obstruction to the arterial flow takes place, such as in chronic occlusive arterial disease, the capillary pressure is decreased until it is almost nil Gangrene may be threatening unless collateral arterial circulation is established Ligation of the femoral vein encourages the development of such collateral circulation When the femoral vein is ligated, there develops an increased resistance to the arterial flow, which in turn increases the pressure on the arterial side, causing a dilatation of the collateral arteries which attempt to re-establish the arterial blood supply For that reason it is now an established procedure to ligate the superficial femoral vein in cases of threatening gangrene of the lower extremity The results justify this procedure

We come now to a condition in which femoral vein ligation is used extensively as a prophylactic and curative measure in the occurrence of pulmonary emboli This procedure has been practiced in some of the recognized clinics throughout the country Some of the enthusiasts have not only advocated and practiced femoral vein interruption in cases of pathology of the circulation of the leg but also as a prophylactic measure preoperatively in abdominal surgery The object of such interruption is to prevent the possibility of emboli from the femoral vein and its tributaries from reaching the pulmonary circulation, producing infarcts and even sudden death from a pulmonary embolism This would appear to be a logical procedure when there is an existing pathology in these veins When no such pathology exists or none is threatened, this operation puts an additional burden on the patient in whom the chances of such an incident are so slight

One may argue, and rightly so, that this is a minor procedure if it be performed by the most competent hands, but that is not always the case Although the analogy is not complete, we may compare it to gallbladder surgery We know of cases where the surgeon, in the dilemma of bleeding from the cystic artery during cholecystectomy, hastily clamps the artery and includes the common duct in the clamp, resulting in biliary obstruction and its dire consequences In the case to be presented, such difficulty was apparently encountered, since the operation lasted an hour, which seems to suggest such a complication

It is now accepted that the p[illegible]site for such ligation, whether it be for cases of arterial occlusion or a prophylaxis against pulmonary embolism, is the femoral vein just below its junction with the profunda femoris The reasons for this location are twofold Ligation above this level is technically more difficult, and may also cause greater disturbance in the form of swelling, discomfort, and discoloration of the leg Yet, even at this level, complicating hemorrhage and even gangrene of the leg may follow the procedure in unskilled hands

The following case prompted the writer to present this discussion

Case Report

A man of 50 suffered from a heart attack in December, 1946, for which he was hospitalized for four weeks When he was almost well enough to go home, he had a chill lasting a few minutes He remained in the hospital and had another chill the following day

To avoid the possibility of emboli, the attending physician advised ligation of both femoral veins, which was done the following day Immediately after the ligation, both legs became cyanotic, and in

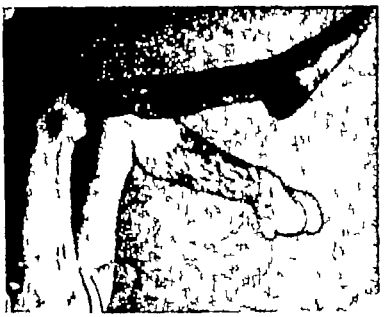


FIG 1 Gangrene of right leg with the loss of left foot and necrosis of soft parts of lower two thirds of leg. In spite of the extreme gangrene, patient was able to move freely even the right leg, since the gangrene stopped short below the insertion of the flexor and extensor muscles of the leg

the course of the next few days the patient developed gangrene of both legs.

The patient received a number of paravertebral nerve blocks in the hope of relieving the spasm of the arteries and thereby helping to establish collateral circulation but to no avail. In spite of the complete gangrene of the right leg and the loss of the left foot with the extrusion of the entire os calcis the patient continued to be treated first in the hospital from January to March and then at home from March to the end of October by means of local applications and internal medication It was only after a great deal of urging by the family and the patient that the doctor in charge yielded to surgical intervention

The patient was first seen by me on October 20 1947 One has to see the condition of the gangrene (Fig. 1) to realize the futility of such procrastination One must speculate as to the cause of the gangrene We may suspect that the gangrene followed the inadvertent ligation of more than the femoral vein It is conceded that ligation of the femoral vein alone should not cause such gangrene The incident is even more striking when both legs were affected. One may not see in a lifetime such an extreme case of gangrene lasting for a period of nine months without surgical relief nor can one appreciate the description of the condition without seeing a record which was taken in the form of photographs and motion pictures

In spite of his prolonged suffering and the gangrenous condition of his legs the patient exhibited great fortitude. He freely moved the right leg which was gangrenous up to two inches below the knee and the left leg from which the os calcis was protruding It was because of the high attachment of the flexor and extensor muscles of the leg, such as the biceps semimembranosus, semitendinosus and the quadriceps extensor through its ligamentum patella, that the patient was able to flex and extend freely the right leg in spite of such high and complete gangrene The appearance of such a condition was shocking

The patient pleaded with me to save every vestige of the living upper part of the right leg. He was fully aware of his condition and figured out for himself the advantages of saving the function of the knee He persisted in spite of the fact that I told him that it might be more advisable to amputate at the knee He would not consent to the operation unless I promised to save the stump below the knee which I did

Preparatory to the amputation of both legs the thickly coated encrustations and debris of the left leg were removed and the underlying surface thoroughly cleansed The encrustation extended to the upper third of the leg. Most of the underlying surface was covered with a new epithelial lining Approximately one third of the surface was covered with granulation tissue which might heal over or might require skin grafting at a later date

Under spinal anesthesia the soft tissues of the right leg below the knee were cut across at the line of demarcation and retracted as high up as possible. The tibia and fibula were sawed across at as high a level as possible, leaving about an inch and a half of the tibia to conserve the insertion of the ligamentum patella in front and the hamstring muscles behind The head of the fibula was then removed so as to avoid its protrusion at the stump The popliteal artery was found patent but not bleeding The popliteal nerve was pulled down about two inches and cut high up to avoid a painful stump The sutures were passed through the end of the ligamentum patella and the posterior ligaments of the knee and fascia to cover the stump The skin and fascia were approximated with interrupted figure 8 silk sutures. One Penrose drain was introduced underneath the fascia across the length of the stump The soft tissues were approximated without tension. The knee-cap appeared to serve as a rounded stump for the thigh The left leg was amputated about two inches above the ankle joint so as to allow enough soft tissue to cover the stump (Fig 2)

Because of the poor vitality of the remaining portion of the left leg, there appeared to be no chance for healing or recovering the use of that part of the

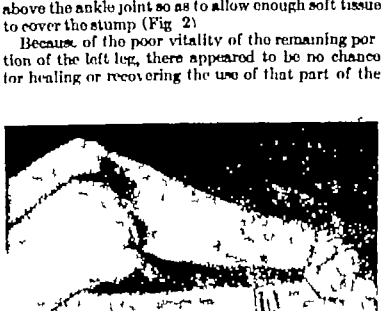


FIG 2 Condition after amputation of right leg below the knee and the left leg just above the ankle.

leg Amputation was decided on and was performed at three inches below the knee on December 7, 1947 Following this amputation, the stump healed well

Because of the prolonged disability, there was a marked flexion contraction of the left knee X-ray shortly after this amputation showed a rarefaction of the tibial stump at the junction of the epiphysis and diphysis and a bowing, not unlike a greenstick fracture, at that point

It was deemed advisable to institute proper rehabilitation to relieve the contracture and to fit him with artificial legs He received this treatment at the New York University-Bellevue Medical Center, Institute of Rehabilitation and Physical Medicine, with gratifying results His morale has been raised to a high standard, and he is now self-sufficient in attending to his regular duties and able to walk about without any aid

In discussing this case with some of my colleagues they called to my attention two cases of venous ligation of the lower extremities performed during the last few months in local hospitals, which were followed by gangrene of the leg Amputation had to be performed in both cases, and one resulted in a fatality The occurrence of such mishaps would tend to show that femoral vein ligation is not to be considered too lightly

This case is reported in detail to illustrate what may happen following femoral vein ligation under unfavorable circumstances It serves to emphasize the need for caution in the selection and the performance of femoral vein ligation

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SURGICAL INSURANCE STATISTICS

Boys incur 15 per cent more surgical operations than girls, with 60 per cent of all children's operations being tonsillectomies and 20 per cent appendectomies or fractures, according to an analysis of 00,000 surgical benefit claims of all ages made by a committee of the Actuarial Society of America and presented at the annual meeting of the Society in New York. This was one of a long list of findings from the study, which covered group surgical insurance claims reported by companies doing 70 per cent of this type of insurance and covering a period of eight months of last year

Group surgical insurance, first written in 1938, has become an important segment of the insurance business, covering 10,000,000 persons, the report stated This insurance, added to protection on an additional 10,000,000 covered by Blue Cross, individual contracts or other plans, gives a total of over 20,000,000 persons now protected by surgical benefit insurance

Eight types of operations were found to account for the greater part of all surgical benefit claims tonsillectomy, appendectomy, benign tumor or cyst, hemorrhoidectomy, fracture, hysterectomy, herniotomy, and dilation or curettage. These accounted for 60 per cent of all claims, 57 per cent of the male cases and 67 per cent of the female cases

Multiple operations take place in a large number of cases, taking advantage of the urgency of the major cause In 17 per cent of all cases, more than one operation was performed under the one procedure, in the case of claims for wives, 31 per cent were multiple, for female employes, 24 per cent, for male employes 15 per cent, and for children 5 per cent In gynecologic surgery, a maximum of 51 per cent was shown On the average, multiple operation claims were for amounts almost double those for single operations.

More complicated surgery was incurred at ages over 50 in the case of men For women, the operations were generally more serious than for men at all ages, but the severity changed little with age, except for a slight peak in late childbearing or post childbearing years

Not all surgery is performed in hospitals, the report shows, though most of it is Men show a higher out-of-hospital surgery incidence than women In the case of men, 23 per cent of the operations were performed out of hospitals, for children, 16 per cent, and for women, 11 per cent The average amount paid for out-of-hospital claims was less than one third that for hospital surgery

Taking appendectomy as an example, it was found that 30 per cent of the doctors charged not over $100, 50 per cent not over $125, 80 per cent not over $150, and 90 per cent not over $165 The analysis was said by the committee to indicate that charges were usually higher for male employes than for women, reflecting the general practice of suiting fees to the ability to pay

Analysis of surgical fees in the cases covered showed that charges were highest on the west coast, with California showing the highest cost of any state In California the charges were 39 per cent greater than the U S average in nonobstetrical cases and 61 per cent over average in obstetrical in the middle Atlantic states, next highest, the charges were 3 per cent and 5 per cent higher than average, respectively

The south Atlantic states showed the lowest cost, 12 per cent and 9 per cent respectively, below average The average surgical claim for male employes was $48, for female employes $63, for wives $71, for male children $34, and for female children $37

THE TREATMENT OF VENOUS THROMBO EMBOLISM

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THIS PAPER is a report of the method employed and the results obtained in the treatment of 160 cases of venous thrombo-embolism at the Columbia Presbyterian Medical Center during the past one and one-half years A medical-surgical team was organized to manage therapy and all patients in this series drawn from all services in the Center, were seen daily by at least one of the members of this group Anticoagulants were used except when contraindicated or when bleeding resulted from their use, and in such instances vein ligation was performed

The rationale for the use of anticoagulant therapy is based on the experimental and clinical evidence that a thrombus in a vein incites an inflammatory reaction leading to fixation of the clot within three to five days Adequate anticoagulant therapy prevents propagation during this period of fixation and during the transition from bed rest to full activity It is understandable therefore, that even with anticoagulant therapy a patient may sustain a pulmonary embolus in the first few days of treatment, since the entire thrombus may not be completely fixed at that time.

Program of Management

In this study heparin was generally used during the first thirty-six to forty-eight hours in order to obtain an immediate anticoagulant effect Subsequently, during the course of dicumarol therapy, heparin was used whenever the prothrombin time fell below satisfactory levels The sodium salt of heparin was administered by intermittent subcutaneous injections The dosage schedule was as follows one hour after an initial intravenous injection of 25 mg 50 mg were given in the deep subcutaneous tissues and beginning three hours later, 30 mg subcutaneously repeated every three hours. It was felt that a persistent elevation of the clotting time was desirable, and accordingly the heparin dose was adjusted to maintain a venous clotting time between twenty and forty minutes, determined by a modified Lee-White method. Bleeding secondary to heparin therapy occurred in only one patient Provided that the injections were given in the deep subcutaneous tissues, significant discomfort was seldom produced and there were only rare small ecchymoses at the injection site. It was found that this subcutaneous method usually eliminated the marked fluctuations of venous clotting time encountered with intermittent intravenous injections and allowed for a sustained effect. A method is being studied at present for administering the sodium salt of heparin by intermittent subcutaneous injection without control of clotting times, but the results to date have not been evaluated

Dicumarol the principal drug, was started on the first day and continued throughout the entire period of treatment Following an initial dose of 200 to 300 mg by mouth the first day, 100 to 200 mg were given on the second day, and thereafter daily doses varied between 0 and 300 mg Variable absorption was noted with administration by rectum although in a few cases the response was satisfactory Daily prothrombin times were determined on whole plasma by a modified Quick method Normal 100 per cent activity was fourteen (plus or minus two) seconds with a desired effective anticoagulant range of twenty two to forty-four seconds, corresponding to 30 and 10 per cent of prothrombin activity, respectively It is believed that this range provides for the prevention of further thrombus propagation and yet reduces hemorrhagic complications to a minimum As noted previously, supplementary heparin was given whenever the prothrombin time fell below twenty-two seconds Excessive hypoprothrombinemia was treated promptly by the administration of synthetic vitamin K in the form of 72 mg of menadione bisulfite given intravenously This usually resulted in a reduction of the prothrombin time to safe range within twelve to forty-eight hours In addition, when bleeding occurred 500 cc of whole blood or lyophilized plasma was given to produce an immediate return of the prothrombin time to a safe range. While this amount of plasma resulted in an immediate reduction of prothrombin time the effect was maintained for only six to ten hours For this reason it was at times necessary to give 500 cc of plasma every six to ten hours until the more permanent effect of the menadione was manifest The prothrombin time of reconstituted lyophilized plasma which contains 0 1 per cent citric acid was determined to be consistently normal

It was observed that 20 per cent of those indi

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viduals receiving dicumarol were hyperreactors to the usual dose of dicumarol, and in these patients significantly lower dosage was necessary This group included chiefly the elderly, debilitated, and undernourished, as well as those with hepatic disease and patients in the immediate postoperative period Minor bleeding occurred in eight cases (5 2 per cent) and major bleeding in two cases (1 3 per cent) There were no fatalities from hemorrhage Patients with a history of previous thrombo-embolism are known to have a higher percentage chance of recurrence following operation or childbirth Individuals in this group have been given dicumarol without preliminary heparinization as a prophylactic measure Some cardiacs and patients with extensive varicosities or malignancy, although without a thromboembolic history, have also received dicumarol postoperatively for prophylactic reasons

As far as the general program of management was concerned, all patients were maintained on complete bed rest with legs elevated during the first six days of anticoagulant administration Undue strain and exertion were strictly avoided If by the sixth day the clinical picture was satisfactory as regards general condition and pulmonary and extremity status, the patient was allowed up and encouraged to walk rather than sit in a chair Anticoagulant therapy was continued until the patient was completely ambulatory, generally another four to six days Penicillin was administered prophylactically to most patients with pulmonary infarction

Results

As shown in the accompanying table, in 60 patients with deep venous thrombosis treated with anticoagulant therapy, subsequent thrombosis took place in three cases (5 per cent) after the cessation of therapy One nonfatal pulmonary embolus occurred on the third day after the start of treatment (1 7 per cent) There were no fatal emboli in this group

In 80 patients with pulmonary embolus as the presenting problem, with or without clinically recognizable deep venous thrombosis, there were three (3 8 per cent) subsequent nonfatal pulmonary emboli, two (2 5 per cent) subsequent venous thromboses, and one (1 3 per cent) subsequent fatal embolus This fatality occurred ten minutes after the first 25-mg intravenous dose of heparin The three subsequent nonfatal pulmonary emboli occurred prior to the sixth day of therapy

In 20 patients with a history of previous thrombo-embolism treated postoperatively or postpartum prophylactically with dicumarol alone, there were no subsequent venous thromboses or emboli

Bilateral ligation of the superficial femoral vein has been carried out during this period in seven patients in whom anticoagulant therapy was considered to be contraindicated or in whom bleeding had resulted from its use Two of these seven patients had a prophylactic ligation of the superficial femoral veins because of a history of previous deep thrombosis In one of these, a nonfatal pulmonary embolus occurred four days following ligation, or two days after a common duct exploration This patient was subsequently treated with anticoagulants and did well

Paravertebral sympathetic blocks have been performed with satisfactory results on ten patients who have shown marked edema, severe pain, or vasospasm

Follow-up data are as yet too brief and incomplete to be significant, but, in general, where the process has been confined to the calf, there have been no postphlebitic symptoms or signs Those patients with ileofemoral thrombophlebitis have had mild to moderate edema for about three to four months

TABLE 1.—Results of Anticoagulant Therapy in 160 Patients with Venous Thrombo-embolic Disease

Type of Case	Number of Cases	Subsequent Thrombosis	Subsequent Embolism	Fatalities
Venous thrombosis	60	3 (5%)	1 (1 7%)	0
Pulmonary embolism	80	2 (2 5%)	3 (3 8%)	1 (1 3%)*
Prophylactic with history of previous thrombo-embolism	20	0	0	0

* The fatality occurred from a massive pulmonary embolus ten minutes after the start of therapy in the form of 25 mg heparin intravenously

Summary

1 The management of thrombo-embolism and the results obtained in 160 cases have been reviewed

2 A method for the administration of the sodium salt of heparin by intermittent deep subcutaneous injection was described

3 Lyophilized plasma has proved satisfactory for the immediate reduction to a safe range of an excessively high prothrombin time associated with bleeding

4 Anticoagulant therapy has proved to be an effective method for the treatment of thrombo-embolism

A portion of the heparin used in this study was supplied through the courtesy of Roche Organon, Inc. Nutley New Jersey

A portion of the dicumarol was supplied through the courtesy of E. R. Squibb & Sons New York City

WHAT IS NORMAL BLOOD PRESSURE?

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FEW FUNCTIONS of the body have been so extensively studied as human blood pressure Nevertheless, a wide divergence of authoritative opinion still exists as to the range of this important physiologic measurement More than a generation ago clinicians accepted as normal an appreciable increment in the systolic blood pressure with advancing years Thus, the formula "100 plus the age ' was in common usage in that early period of *clinical sphygmomanometry* Within the last twenty five years, however, the highest acceptable reading of the systolic blood pressure has been persistently lowered so that today 140 mm is generally regarded as the ceiling level irrespective of age [1-5] According to this view a reading above 140 mm is just as abnormal in an old man as in a young one [3] Indeed it has even been claimed that normal blood pressure remains constant throughout life that it never exceeds 120 mm and that levels above this limit at any age are in the zone of hypertension [6]

Conflicting with the concept that normal blood pressure is little altered by age are the observations reported by others [7-11] An analysis of 1,000 elderly seamen for example, disclosed that 87 per cent had systolic blood pressures above 120 mm., and 64 per cent had levels above 140 mm [9] With the former limit, therefore only 13 per cent of the series would have qualified as normal and with the latter only 36 per cent Normal blood pressure so defined presents the paradox of being increasingly uncommon with advancing age If these standards are to be upheld it must be concluded that hypertension is the usual finding after middle age and that abnormal elevation of the blood pressure is generally compatible with longevity Numerous statistical surveys however, fail to support the latter conclusion

On the other hand, an appreciable percentage of elderly persons manifests elevated systolic blood pressure with normal or low diastolic blood pressure, for example, 170/70 These persons, unlike those with diastolic hypertension, generally have no significant abnormalities of the cardiovascular system The frequency of this type of systolic hypertension increases appreciably with age (Fig 1), having been noted in more than one third of the male subjects over 60 in one series.[11] Such elevation of the systolic blood pressure has been attributed to diminution in the elasticity of the aorta and its large branches. That the elasticity of arteries diminishes progressively with advancing years, becoming particularly marked with the fifth decade, has already been established [12] Experimental studies also lend support to the view that decreased arterial elasticity causes a rise in the systolic and a fall in the diastolic level [13] A similar trend with age has actually been noted clinically in normal blood pressure levels [9-11] It appears likely therefore that loss of arterial elastic tissue as well as *systolic hypertension to which it frequently gives* rise are comparable to such physiologic changes as occur in the hair, skin, skeleton, and other structures with advancing years Statistical studies dealing with life expectancy in elderly persons with systolic hypertension are conspicuously lacking Unfounded conclusions have been drawn concerning this group because of failure to separate them from persons with diastolic hypertension and because of inferences based on findings in younger age groups

Age however, does not exert its influence upon blood pressure solely through involutionary vascular changes. A neurogenic factor in addition to the vascular one is also operative [11] By means of the cold pressor test it has been shown that the response of the blood pressure to a standard stimulus increases progressively as persons grow older [14 15] This effect appears to result from increasing sensitivity of the vasomotor centers with age Since the act of measuring the blood pressure is also a relatively standard stimulus (psychic

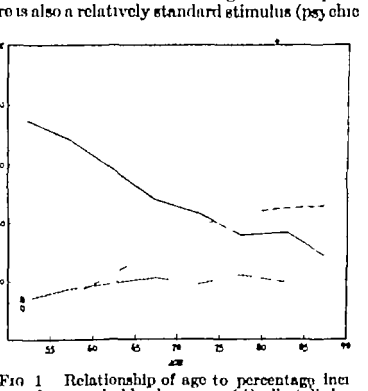


FIG 1 Relationship of age to percentage incidence of normal blood pressure (*A*) diastolic hypertension (*B*) and systolic hypertension (*C*)

in nature), progressively higher levels of normal blood pressure are to be expected from this influence with advancing years Thus, the neurogenic factor tends to elevate both the systolic and diastolic pressures, while the vascular factor tends to increase only the systolic level while simultaneously depressing the diastolic The combined effect of these influences is a marked augmentation of the systolic reading with but little change in the diastolic reading with age

These considerations demand that normal standards allow a progressively increasing range in the systolic blood pressure while permitting but little variation in the diastolic level with succeeding decades The significance of the systolic reading should, therefore, be de-emphasized in the latter decades of life, since it is the diastolic level alone which can establish the existence of hypertensive disease The formula "100 plus the age," formerly employed as an index of normal blood pressure, seems to reflect fairly accurately the tendency of normal systolic blood pressure to increase with age

Published reports dealing with younger groups indicate that normal diastolic blood pressure probably never exceeds 90 mm [16–18] Certainly no higher limit would seem acceptable after middle age

The current standards of normal blood pressure and attitude toward the hypertensive patient are resulting in immeasurable harm both through improper diagnosis and overemphasis upon a disease which as yet has no effective therapy As matters now stand most patients probably ought never to be told that they are hypertensive

References

1 Stieglitz E J Abnormal Arterial Tension New York National Medical Book Co 1935
2 Musser, J H. Internal Medicine, 3rd ed Philadelphia, Lea & Febiger, 1938
3 Alvarez E C and Stanley L L Arch. Int. Med. 46 17 (1930)
4 Huber E G Human Biol 5 542 (1933)
5 Faught, F A. M J & Rec 135 160 (1932)
6 Robinson S C and Brucer M Arch Int. Med 64 409 (1939)
7 Miller I NEW YORK STATE J MED 41 1631 (1941)
8. Master A M Marks H H and Dack S J A M A 121 1251 (1943)
9 Russek H I Am. Heart J 26 11 (1943)
10 Russek H I and Zohman B L Geriatrics 1 113 (1946)
11 Russek H I Rath M M Miller I and Zohman B L Am. Heart J 32 468 (1946)
12 Wiggers, C J Physiology in Health and Disease 3rd ed Philadelphia Lea & Febiger 1939 p 636
13 Herringham W P and Wills W A Trans. Med Chir Soc. Edinburgh 69 499 (1904)
14 Russek H I Am Heart J 26 398 (1943)
15 Russek, H I and Zohman B L. Am. Heart J 29 113 (1945)
16 White P D Ann. Int. Med 18 323 (1943)
17 Levy R L. White P D, Stroud W S, and Hillman C C J A M A 128 1059 (1945)
18 Hines E A, Jr J A M A 115 271 (1940)

BATTLE ALCOHOLIC PROBLEM

A "hands across the continent venture" for battling the problems of alcohol will get started this summer when the Yale Institute of Alcohol Studies in the Southwest is established. The joint attack by Connecticut and Texas educational and scientific leaders was formally inaugurated at a two-day celebration at Fort Worth, Texas, May 14 and 15

Plans for the establishment by Yale University of a large, long-range research and clinical center in cooperation with Texas Christian University were announced by Dr Howard W Haggard, director of the Yale Laboratory of Applied Physiology

As now planned, the Yale Institute of Alcohol Studies in the Southwest will comprise the following activities

1 A research unit in the social sciences at Texas Christian University

2 A clinic for the rehabilitation of alcoholics at Dallas

3 A summer School of Alcohol Studies at Trinity University, San Antonio This will be patterned after the nationally famous summer school conducted each year in New Haven by Yale

4. Informal educational activities, at all levels, throughout the state

The clinic in Dallas, Texas, under the direction of a psychiatrist who has specialized in the treatment of alcoholism, will conduct research on physiologic sensitivity to alcohol, psychologic factors contributing to alcoholism, preventive mental hygiene, and tests of new methods of treatments All work will be carried out in cooperation with medical institutions which will receive grants from the Yale Institute

The clinic will maintain inpatient and outpatient services, will accept referrals from all sources, and will offer its services particularly to the police courts in order to replace admittedly useless penal methods by clinical treatment It will seek to use all community resources in the care and treatment of alcoholics One of its most important functions will be the training of clinical personnel to meet the great demand for specialists

The research unit in the social sciences will consider methods of alcohol education in schools, investigation of social, economic, educational, and religious factors which may be used in the prevention of inebriety, determination of the extent and intensity and nature of alcoholism in Texas and the Southwest in various age groups, occupations, rural and urban areas, a survey of the effectiveness of liquor control laws

—*Science News Letter, May 15, 1948*

SURGICAL TREATMENT OF HYPERTENSION

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DURING the past few years 28 persons have been subjected to varying degrees of sympathetic denervation in this city for the relief of essential hypertensions It is proper to remark that the early operations were made possible by the progressive scientific viewpoint of my surgical colleagues Dr Lew H Finch and Dr C A Spence and subsequently by the medical practitioners of this community

The commonly accepted indications and contraindications for sympathectomy were observed in those patients In particular it was felt that people with extensive renal damage were not candidates Furthermore, an attempt was made to evaluate the cardiac status accurately by physical examination, x ray studies and electrocardiography Advanced myocardial damage was considered to make the operation too hazardous Thus patients with known episodes of congestive failure in the past and those with excessive enlargement of the heart were, as a rule rejected On the other hand, several patients who stood the operation well and benefited from it have had one or more cerebrovascular accidents One case was a thirty two-year-old man who was operated upon still bearing the stigmata of his stroke, who has had a pressure of 150 to 160 systolic since his operation in 1944 and who works every day In other words, the operation may be offered to the younger group of hypertensives without severe myocardial or renal damage whose blood pressure can be shown to be labile and not fixed by the sedation tests

The majority of the patients were in the third or fourth decade, but two patients in their fifties were operated In these older cases the Max Peet operation was done that is a bilateral sympathectomy confined to the thoracic region resecting a liberal segment of the splanchnic nerves and the chain from eighth or ninth thoracic to the eleventh or twelfth thoracic. Some of the remaining cases were done by the Smithwick technic but the majority had the extremely radical combined thoracic and lumbar operation which is recommended by James L. Poppen [1] A 2-inch segment of the eighth and eleventh ribs was resected posterior to the angle and the sympathetic chain was removed from the fourth thoracic downward The entire greater and lesser splanchnic nerves were mobilized in continuity with the chain Below the twelfth rib the retroperitoneal area was entered and the first and second lumbar ganglia were mobilized and the splanchnics cut as they enter the celiac ganglion This exposure gives an opportunity for inspection of kidney and adrenal and biopsy if indicated, and it preserves the integrity of the diaphragm Thus radical operation appears to give better results as far as reduction in pressure is concerned and especially as regards persistent postural hypotension, but symptomatic relief was not influenced by the extent of the procedure

The hospital mortality was not excessive One patient died on the table at the completion of a first stage operation She was a twenty-eight year-old woman with malignant hypertension and a grave degree of cardiac impairment Another patient died of heart failure a week after a first stage procedure Both of these cases occurred early in my experience and represent serious errors in surgical judgment In addition to the latter, three patients are known to have succumbed to cardiovascular disease These three patients were advanced hypertensives but all were well enough to be working at the time of death

Of the 23 cases which remain four were lost to follow-up Of the 19 whose present status was known, ten had a substantial and persistent fall in blood pressure Of these ten at least three had a normal blood pressure and were symptom-free one for five years one for three years and one for one year after operation The average drop in blood pressure however, was 40 to 50 mm. systolic and 20 and 30 mm diastolic. The remaining patients had a pressure approximating their preoperative level One would estimate therefore that a worthwhile result may be had in about 50 per cent of the operative cases and that the mortality will be somewhere between 1 and 5 per cent, depending upon the selection of cases All workers in the field have been impressed with the striking symptomatic relief afforded by this operation with special reference to headache and dizziness. There was no case in this series in which symptomatic relief was not obtained, even when a modified operation was carried out

The complications were few despite inadvertent pneumothorax in about one-fifth of the cases No significant pleural effusion or empyema resulted No serious wound infections occurred although cotton was frequently used as suture material. The average hospital stay was three and one-half weeks The chief complication, from the patient's standpoint is wound pain. This has the features of an intercostal neuritis and

Presented at the Fourth District Branch of the Medical Society of the State of New York, October 23 1947

is presumed to be due either to traction on the rami communicantes when separating the ganglia or to trauma at the time of the rib resection This pain has been extremely troublesome and refractory to treatment However, it always subsides eventually as the traumatic intercostal neuritis heals

In conclusion, one might say that this operation has something worthwhile to offer to the severe hypertensive, especially those in the earlier decades It is to be considered, in the main, a palliative operation, and it carries a low mortality and morbidity One may anticipate relief from disabling symptoms and, indeed, achieve an occasional brilliant cure My results do not agree with those who feel that a high percentage of patients are markedly benefited However, it is conceded that with increasing experience improved results are being obtained There does not seem to be any doubt that it represents the most effective means at our disposal in dealing with a condition which, in its various forms, has become one of the leading causes of death in our generation

Reference

1 Poppen J L and Lemmon, C J A M A. 134 1 (May 3) 1947

NEW DRUGS SAID TO LIMIT DEATHS OF HEART DISEASE

Deaths from coronary thrombosis—one of the most common and most serious forms of heart disease—can be cut from one third to one half with new blood-controlling drugs, a twenty-months' nationwide study showed in May

The investigation was sponsored by the American Heart Association with financial support of the United States Public Health Service It involved 1,000 patients in 17 United States hospitals

The drugs used principally are the anticoagulants dicumerol and heparin They tend to prevent blood from clotting Coronary thrombosis is formation of a blood clot in an artery leading directly to the heart If the clot becomes big enough to shut off all or most of the blood to the heart, the sufferer dies

Dr Irving S Wright, associate professor of clinical medicine at Cornell University, described the study in a paper for the Illinois State Medical Society

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VA TO OFFER JOBS TO YOUNG DOCTORS

The Veterans Administration disclosed in April what it hopes will be a solution to a shortage of some 1,400 doctors which will face the VA between June 1 and August 1

The doctors who will depart are those who were trained free during the war under the Army and Navy special training programs and who will be completing their commitments to give service in exchange for education.

Dr Paul B Magnuson, VA Medical Chief, said recently that an appeal would be made to recruit doctors who are completing their resident requirements in hospitals, and who still must be two years in practice before full certification He said that there are now 6,000 such residents in training in private hospitals, and 2,000 in the 126 VA hospitals in the country "We will offer them full-time VA appointments in which they can work out their two years of practice," he said

He also said that a plan was being made to separate the outpatient departments of VA regional offices from the examination department, so as to leave the VA physicians free to conduct examinations for pensions, and have the outpatient treatments carried on by local doctors on a part-time basis

Dr Magnuson warned, however, that "a feeling of uncertainty as to the future of the VA medical program" since the personnel cuts under the blanket order of February 10 had been destroying morale in the service and retarding recruitment "While a cut-down of medical personnel had not been intended in the retrenchment order made necessary by reduced appropriations," he said, "such a cut-down nevertheless had taken place throughout the country "

THE ELECTROCARDIOGRAM IN CATATONIC SCHIZOPHRENIA

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(From the Binghamton State Hospital)

UNTIL recently, electrocardiographic studies in mental disorders were few in number and were concerned mainly with cases of circulatory asthenia and anxiety states Most recent publications showed electrocardiographic abnormalities in a larger group of cases. However, only a few were schizophrenics, and no mention was made of the type of schizophrenia to which these patients belonged

This paper is concerned with the study of 52 young schizophrenics of the catatonic and hebephrenic type The great majority were of recent onset They were all psychotic when studied and all but a very few were either in a state of catatonic excitement or stupor That condition made the study particularly difficult and prolonged However only in four cases was it ultimately necessary to resort to intravenous barbiturate sedation

Thirty-six cases belonged to the catatonic type, 16 to the hebephrenic type with catatonic episodes Thirty five were women, 17 men Their ages ranged from fourteen to thirty five years 27 were in the age group of fourteen to twenty-six (ten of them in their teens), and 25 were between twenty-six and thirty five years of age The age was limited to thirty five years to make reasonably sure that no latent cases of coronary artery disease would be included in the study

In all the cases, clinical history and examination and radiologic study revealed no evidence of cardiac disease All the patients had the asthenic-athletic habitus

All the electrocardiograms were taken in recumbent position and at 10 mm. (1 millivolt) standardization Sixty-one electrocardiograms were studied, in eight cases, more than one electrocardiogram was available

Particular attention was given to the following data pulse rate duration of the P-R interval, the form, size, and direction of the P and T waves axis deviation, ST segment depression and arrhythmias, if considerable enough Those features which were omitted were done so because it was felt that they were not different from what is considered standard in young adults

The T waves were considered low when less than 1 mm (0 1 millivolt) in amplitude The ST segments were considered depressed when more than 1 mm below the isoelectric line (T P interval), and R_4 was considered short when less than 2 mm

The pulse rate was found to be below 70 in four cases and above 100 in six cases

The P R interval was between 0 07 and 0 11 in 24 cases, which means a 46 per cent incidence compared to 0 per cent in normal adults of the same age group A detailed list of P R intervals is given in Table 1 with comparative percentages in healthy young adults of the same age group obtained from the studies of Graybiel *et al* [1] No relationship could be found between the presence of short P R intervals and the pulse rates, and some of the shortest P R intervals occurred in cases with the slowest pulse rates (Figs 1 and 2)

TABLE I —DURATION OF THE P R INTERVAL IN 52 CASES

P R Interval in Seconds	Incidence*	Percentage	Normal Values Per Cent
0 07	1	1 6	
0 08	3	4 9	
0 09	3	4 9	
0 10	11 (2)	21 1	
0 11	6 (1)	11 3	
0 12	14 (4)	26 9	7 6
0 13	4	6 5	8 3
0 14	4 (1)	7 6	21 1
0 15	3	4 9	11 7
0 16	1 (1)	1 6	24 9
0 17	1	1 6	9 5
0 26	1	1 6	

* Numbers in parentheses indicate incidence in follow-up tracings.

The largest incidence of absent P waves was found in the chest lead and the same applies to the negative P waves The greatest number of diphasic P waves were found in lead III Abnormal P waves in the chest lead were found in 90.3 per cent of these cases as compared with the

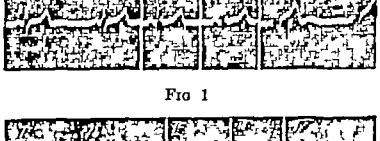


FIG 1

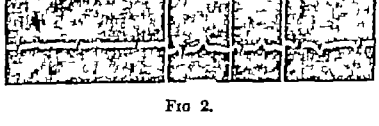


FIG 2.

Presented at the Interhospital Conference of the Mental Hygiene Department, Psychopathic Institute Syracuse April 3rd 1948.

TABLE 2 —P WAVES

	Absent	Diphasic	Negative
Lead I	0	0	1
Lead II	2	0	0
Lead III	1	9 (1)	3
Lead IV	7	5	35 (7)

41 per cent of abnormal P_4 in Graybiel's study (Table 2) [2]

The T wave abnormalities are given in Table 3 Abnormal T waves in lead III were found twice as many times as in Graybiel's study In the chest lead of healthy young adults Graybiel found only 0 2 per cent T wave abnormality (diphasic T waves), while in the present study negative T_4 was found in 25 1 per cent of the cases, and all the abnormalities in chest lead totaled 40 3 per cent

TABLE 3 —T WAVES

	Low	Diphasic	Negative
Lead I	6 (1)	0	2
Lead II	2	2	2
Lead III	8 (2)	7 (2)	12
Lead IV	5 (2)	3	13 (2)

The R waves in chest lead were small in ten cases and absent in one

Abnormal P, R, and T waves in chest lead, in combination of any two or all three in the same record, occurred in 22 cases or 42 3 per cent

ST segment depressions were found in eight cases (15 3 per cent) in lead II, and in seven cases (13 5 per cent) in lead III Normal incidence would be 0 and 0 6 per cent, respectively

Tendency to left axis deviation was found in five cases and tendency to right axis deviation in six cases Sinus arrhythmia occurred in four cases

Some electrocardiograms are presented for illustration Among them are the records of five of those cases in which more than one record was

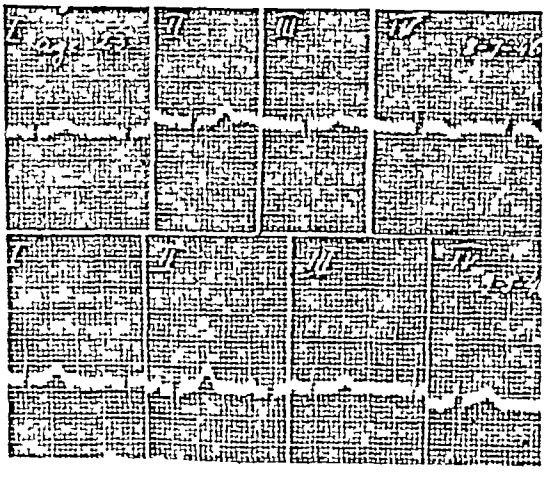


FIG 3

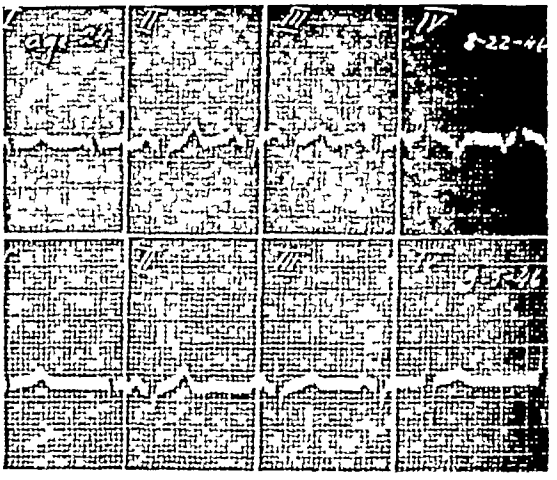


FIG 4

obtained Although this paper is not dealing with the relationship between clinical improvement and favorable electrocardiographic changes subsequent to therapy, it is interesting to mention that, in some cases (Figs 3, 4, 5), the second tracings show some favorable changes coincident with clinical improvement However, one case (Fig 6) showed no improvement in subsequent records, and the patient also failed to show any improvement from electric shock and insulin treatment

In the case of a young woman whose catatonic excitement was uninterrupted and in whom all treatments were ineffective, a prefrontal lobotomy was performed on March 14, 1947 Since then, although constantly psychotic, she is less fre-

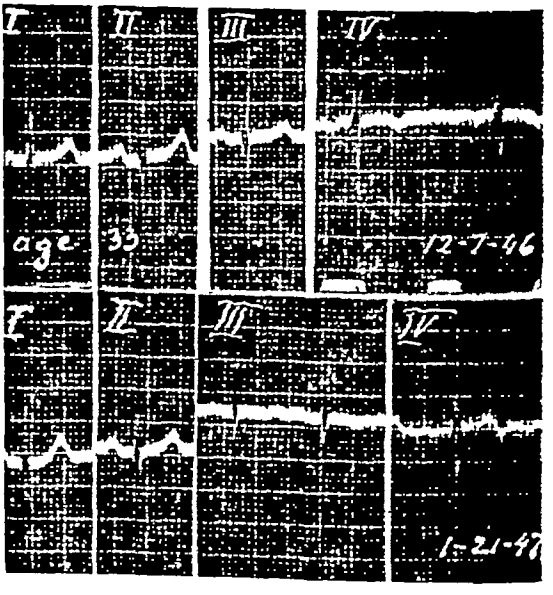


FIG 5

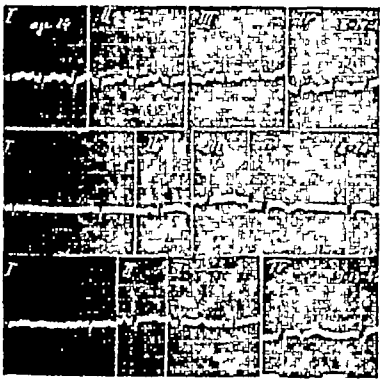


FIG 6

quently disturbed The recent electrocardiogram (Fig 7) was taken while she was in a cooperative mood (the first was taken after seven futile attempts) and shows absent or inverted P_3, absent P_4 low T_4, and a small R_4, while the rhythm is regular

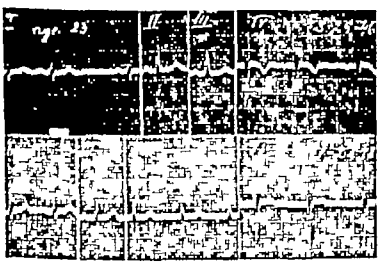


FIG 7

Discussion

Through the studies of Stewart and Manning and Graybiel and his coworkers we have the normal electrocardiographic values in the average healthy young adult [1 2] The findings discussed in this paper are so strikingly different from the norms that their significance cannot be overlooked The extreme shortening of the P R intervals, the frequency of abnormal P and T waves in the chest lead, and the frequent occurrence of ST segment depressions are patterns which deserve comparative studies with experimental work

Experiments on animals and humans demonstrated that mechanical, electrical and pharmacodynamic stimulation of the cardiac parasympathicus and sympathicus causes electrocardiographic changes similar in many ways to those described in this paper Also it was argued that the occasional presence of mixed sympathicotonic and vagotonic ECG changes may be due to a vagotonic state in the auricle and a sympathicotonic state in the ventricle (Bezold's effect) Mixed ECG changes occurred many times in the cases described here (Figs 2, 6)

All the patients in this study presented one or more signs of autonomic imbalance such as hypothermia, excessive sweating and cyanosis of the hands and feet, axillary hyperhidrosis, excessive salvation or excessive dryness of the mouth, vomiting, fecal and urinary retention or incontinence labile pulse rate, labile blood pressure, fever, and erectivity of the pilomotor apparatus The rejection of food may be due to gastrointestinal secretory dysfunction Fear rage, and elation are emotions governed by structures which are in close connection with the autonomic nervous system

It is probable that the electrocardiographic abnormalities under discussion are due to imbalanced autonomic activity causing alterations in the myocardial innervation and in the coronary blood supply Is this disturbed functioning of the higher centers of the autonomic nervous system the cause or the result of catatonic schizophrenia?

Summary

Electrocardiographic abnormalities in catatonic schizophrenia are presented The characteristics of P-R intervals P R, and T waves, and ST segments are discussed

These abnormalities are attributed to the imbalanced autonomic nervous system.

References

1. Graybiel, A. McFarlan R. A. Gates, D C., and Webster F. A.: Am. Heart J 27 524 (1944)
2. Graybiel, A. and White, P D Am. Heart J 10: 345 (1935)
3. Stewart, C. V., and Manning, G W: Am. Heart J 27 502 (1944)

Pulmonary tuberculosis can be arrested but never cured —*Exchange*

A painless otitis media is likely to be tuberculous.—*Exchange*

PILONIDAL CYST SURGERY—A MODIFICATION

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(From the Kew Gardens General Hospital)

MANY operations have been described for the removal of a pilonidal cyst Any of the technics described in the literature will be successful if properly applied In most cases, however, the usual technics require the removal of a very large area outside the actual cyst wall Thus, a large section of normal tissue is removed at the same time that the cyst tissue is removed

This removal of normal tissue increases the size of the resultant wound Healing time is thus prolonged The danger of dead space at the bottom of the wound is increased, and apparent recurrence due to dead space is more frequent The technic to be described avoids these difficulties Practically no normal tissue is removed so that a smaller than average wound results

However, I have described this technic before, and the purpose of this communication is not only to indicate further the simplicity of this technic but to describe one important new feature [1] This new feature is the complete avoidance of hemostatic ligatures

It will be obvious that, if it is not necessary to clamp and tie the multiple bleeders inevitably found in any area of pilonidal surgery, the operating time will be much reduced Furthermore, if the wound is to be closed, the absence of hemostatic ligatures will increase the frequency of successful healing after primary closure The foreign body action of buried sutures is thus avoided Furthermore, the need for hemostatic ligatures being eliminated, the technic becomes even more simple than originally planned and should further quiet the fears of those who are deterred from ambulatory surgery This operation is, of course, completely ambulatory

Most patients who consult the proctologist present infected pilonidal areas However, if there has been no infection, complete excision and primary closure is the procedure of choice If infection has been present recently, the wound is not closed Inasmuch as most wounds will require open surgical excision, it is important that the wound be as small as possible after surgery A minimum amount of tissue should be excised at the time of operation, and it is desirable to avoid the necessity for burying ligatures

All pilonidal surgery may be ambulatory Indeed, practically all rectal surgery may be ambulatory At the present time I find no indication for hospitalization in any case of rectal surgery aside from carcinoma

The anesthetic employed for the excision procedure is usually caudal Forty cc of $1^1/_2$ per cent metycaine is injected into the caudal canal The analgesia develops within five to twenty minutes after injection and is very complete If desired, local analgesia may be employed In such cases a wide local infiltration should be performed through two lateral puncture points Again, $1^1/_2$ per cent metycaine is the anesthetic of choice

Technic

The patient is prepared by shaving and antisepsis The prone position is best, with adhesive strap retraction of the buttocks Analgesia, as above described, is either by wide local infiltration or by caudal block

The initial incision is a midline anteroposterior stroke extending through the sinus and cyst This incision defines both the depth and the anterior and posterior limits of excision If the cyst is not palpable before incision, the initial length of incision should be abbreviated It may be lengthened subsequently as required by the gross pathology The cyst and sinus tissue will be grossly evident as contrasted with the surrounding, normal, yellow fat lobules This primary incision is carried only into normal fatty tissue both anteriorly and posteriorly, it should not be extended unnecessarily If it is extended excessively, it will result in a wider area of excision than is necessary It is only desired to excise the sinus tract, the cyst wall, and a minimum of surrounding normal tissue Most recurrences are due not to residual tract or cyst tissue but rather to residual infection

The depth of this initial incision will be to the sacrum in most cases The next incision is transverse, at the central point of the cyst cavity This incision should extend only into normal fatty tissue on either side of the cyst By means of these two incisions the four outermost points of excision are established under direct vision In so doing, the usual guesswork of the ordinary excision technic is eliminated When these excision points—the anterior, posterior, and two lateral points, are demarcated, they are connected by slightly curved incisions These lateral incisions must completely surround the pathologic tissue In some cases irregular extensions of the

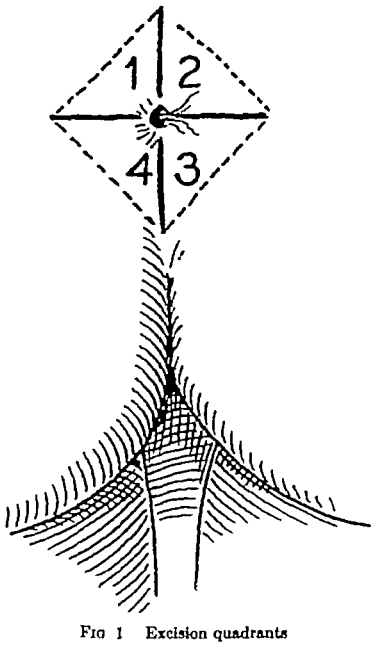


FIG 1 Excision quadrants

diseased tissue will necessitate altering the lines of the connecting incisions. In most cases, however, only a small block of tissue need be excised The resulting wound is extremely small in comparison with the usual massive pilonidal excision technic

The actual excision of pathologic tissue should be carried out in four quadrants (Fig 1) If it is considered that we have an anteroposterior and a transverse incision, it will be recognized that we divide the pathologic tissue into four sections Each section should be removed separately Let us consider that we operate in a clockwise direction and remove the section from nine to twelve first. The moment this section is removed gauze should be packed into the resultant wound (Fig. 2) This gauze should be packed firmly and held in place No hemostats are placed on bleeders The gauze packing will control all ordinary bleeding The next segment to be removed is the segment from 12 to 3 on the clock face. Similarly gauze is packed into this wound immediately upon complete excision (Fig 3) Indeed, the gauze packing should go into the wound as the tissue is elevated by the scalpel. Thus, the tissue will be dissected from the lateral

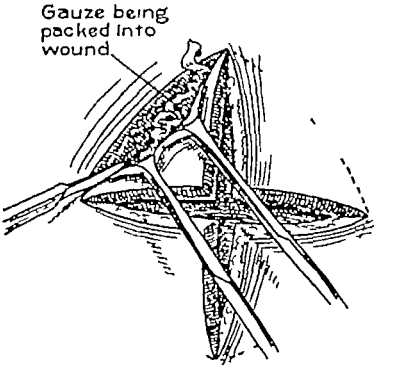


FIG 2 Excision and gauze-packing technic.

excision points inward to the midline, and gauze will be packed into the wound as the tissue is elevated

A similar technic of excision with concurrent packing of gauze employing the usual gauze squares, is followed in the third quadrant from 3 to 6 o clock, and then in the last quadrant from 6 to 9 o clock Of course, this order of excision need not be followed It is here offered as the most convenient However, the operator may remove the segments in any direction desired I might state that this technic of immediate packing with gauze as the dissection proceeds may be employed with any type of pilonidal excision It will produce complete hemostasis without hemostats and ligatures as the operation progresses.

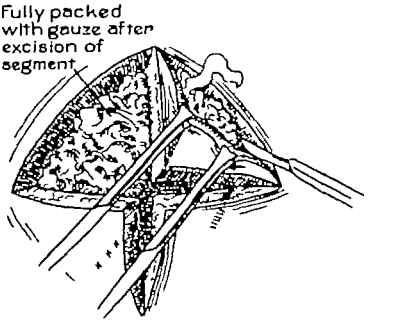


FIG 3 Excision of second quadrant.

If the wound is to be left open, an oxidized cellulose packing* is then placed over the base of the wound and along the lateral walls Gauze squares are then packed over the Oxycel to fill the wound cavity completely

A tight adhesive strapping is then applied I shall not describe here the technic of closure for those wounds that are to be completely closed after surgery This has been described elsewhere in sufficient detail [2] It is my present purpose merely to emphasize the cruciate incision technic for the excision of pilonidal disease It is my further purpose to point out the fact that hemostasis may be very completely accomplished without the use of hemostats or ligatures

Of course, the patient is allowed to leave the operating table, to dress, and to drive his car home, within thirty to forty-five minutes after the completion of the surgery This time interval is necessary to permit the disappearance of all caudal analgesia effect

* Oxycel produced by Parke Davis and Company is an excellent product of this nature.

Summary

One-hundred and eighteen cases have been operated in this fashion to date There has been no postoperative bleeding in any case Healing has been uneventful Healing time has been shortened as a consequence of the minimal area of excision All patients have been ambulatory immediately after surgery and back at their usual occupation within twenty-four to forty eight hours

43-55 Kissena Boulevard

References

1 Cantor Alfred J J Internat Coll Surg. 8 51 (Nov.-Dec.) 1945
2 *Idem* Ambulatory Proctology New York Paul B Hoeber Inc 1946

MENTAL HOSPITALS IN U S ARE 16 3 PER CENT OVERCROWDED

Mental hospitals in this country are overcrowded by 16 3 per cent of their capacity, the United States Public Health Service reported recently

With a normal capacity of 382,426, the state hospitals for mental disease have an average daily resident population of 444,785 persons, or 62,359 more than the institutions should have

The excess runs to more than 50 per cent in a few states At the other end of the range, South Dakota has 13 per cent more capacity than is being used

In New York State the average daily resident population is 76,114, with the normal capacity a 65,697 While personnel shortages in mental hospitals were reported to be abating, this gain is offset by overcrowding and rising maintenance costs

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EXPERTS SAY PHYSICIANS ARE UNPREPARED FOR ATOMIC ATTACK

In a recent address in Washington, D C , Rear Admiral Clarence J Brown, assistant chief of the Bureau of Research and Medical Military Specialties, declared that the nation's physicians are unprepared for the emergency of an atomic bomb attack in the event of another war He advocated that all medical practitioners take training in military aspects of medicine "The general public," he said, "may possibly derive some comfort from the hope that threat of retaliation might minimize an enemy attack"

"Not so of the medical profession," he said, "its work begins before any retaliation Long before the retaliation bombs are received by the enemy, we shall be confronted in our great cities by the world's greatest catastrophe, such utter devastation, such unexampled human misery as transcends the imagination During the immediate hours and days which follow, who will bear the burden of the professional care of the survivors? Who will set up the sanitary controls, provide the mass inoculations, insure the safety of food and water supplies, and direct the diagnosis and treatment of those who are suffering insidious radiation illness?"

MANAGEMENT OF SEVERE POSTLUMBAR PUNCTURE HEADACHE

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(From the U.S. Naval Hospital Brooklyn)

LUMBAR puncture headache was found to be the most annoying complication in a series of 400 low spinal vaginal deliveries to be reported by Ahearn and Huston [1] The over-all incidence was 10 5 per cent with 10 per cent lasting three or more days These figures were uncorrected and include any reference to headache in the nurses or doctors notes If anything, the figure is high rather than low Nevertheless the problem was of sufficient magnitude to give rise to the following study

The series of cases for this report were selected from a group of several hundred women who were delivered by low spinal anesthesia The anesthetic agent was for the most part, 5 mg of pontocaine in 1 cc of 10 per cent glucose, administered with the patient sitting up, so as to produce a low spinal anesthesia with the hyperbaric solution Usually a Number 20 gage needle was employed, although with a cooperative patient and available time a Number 22 gage needle was used Premedication usually included pentobarbital sodium, demerol, and scopolamine

The patients were permitted to be ambulatory on the second postpartum day Typically the headache would be noticed on the second day after delivery It would be exaggerated by walking or raising the head and relieved by lying down The patient would complain of a dull ache in the occipital region and behind the eyes The neck muscles would become stiff A heavy weight seemed to press on the cranium and cloud the mental processes Some had anorexia, nausea, and vomiting Usually, the headache would improve as the days went by, but sometimes the patient s complaints would persist day after day much to the distress of her physician

Aspirin and even codeine proved to be of little relief for the severe case Infusions of glucose and saline did not alter the condition Caffeine sodium benzoate and nicotinic acid did not help A rare patient seemed to note good results from 50 cc of 50 per cent glucose intravenously but this was transitory We have had little experience with the abdominal compression method of Weintraub but admit that this may give relief by indirectly raising the spinal fluid pressure [2] Amphetamine sulfate in doses of 5 to 10 mg three times daily in mild cases would relieve the headache completely and improve the more severe types This drug was withheld from cardiac and hypertensive patients, and care had to be maintained lest palpitation and tachycardia develop

When the patients with headache were asked to bear down or repeat the Valsalva experiment the pain would disappear Since amphetamine sulfate also raises the spinal fluid pressure, these findings suggested that we were dealing with a spinal fluid hypotension headache [3] Spinal manometric readings on severe cases confirmed this impression This is in agreement with Jacobaeus and Trumerie, more recently Kunkle and Ray Wolff, and others [4 5] The spinal fluid pressure is often found to be inversely proportional to the degree of the headache In some cases no fluid at all could be aspirated with the patient on her side and when sitting up, only a small amount could be secured These facts would help to rule out the meningeal irritation theory

It would seem logical then that the spinal fluid escapes into the extradural space through the puncture hole This escape is augmented by labor and bearing down During contractions, the fluid will shoot out of the needle under a marked increase in pressure With the patient in active labor, difficulty in keeping the patient in position may necessitate multiple perforations of the dura before a definite tap is secured. This factor as well as large needle size, seems to provoke headaches The few drops of initial fluid loss associated with the spinal anesthesia do not seem to have any bearing on the incidence of headaches Kunkle has pointed out that headache can be produced experimentally by withdrawal of approximately 20 cc of spinal fluid with the patient erect [6] Investigators doing encephalography report an extremely high incidence of severe headaches that arise immediately after the spinal fluid is drawn off [6] This seems to be more related to the amount of fluid drawn off than the gas injected We feel that the anesthetic agent for the deliveries played no part in causing the headaches In fact, diagnostic spinal punctures run a high incidence of difficulty as witness the 10 per cent of Underwood [7]

It comes to mind then that if we are dealing with a spinal hypotension headache that does not respond to drugs and measures that raise the pressure and relieve the pain, the next choice would be to replace the fluid Pickering in 1939 injected warm saline solution into the sub-

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The opinions expressed herein are those of the author and not necessarily those of the Navy Department. Investigations were carried out at U.S. Naval Hospital Brooklyn, New York.

arachnoid space with relief of headache in a patient [8] This is a preliminary report on a relatively small series of cases in which this procedure was carried out for a therapeutic effect

Method

It was found that when even as little as 5 cc of glucose in distilled water or glucose in saline solution were injected intrathecally, the headache would start to disappear By the time 15 cc had been injected, the headache was almost invariably gone An attempt was made to add enough fluid to approximate normal spinal fluid pressure as recorded by a water manometer No more than 20 cc was injected into any one patient

Extreme care was employed in carrying out this infusion technic Fresh, sterile solutions were used Autoclaved instruments were employed The operator performed a surgical scrub and draped the back of the patient after preparation with soap and merthiolate A Number 22 gage needle was used, and it had to be inserted skillfully with the first attempt One must look for beads of fluid on the stylet and wait for the appearance of a drop of liquid or even aspirate, if in doubt about the location of the needle One must bear in mind that the pressure will be low It is understood that more accurate readings could be taken with a larger needle, but it is imperative to keep this second perforation small Before readings were taken, the patient was encouraged to cough or bear down in order to raise the fluid level in the manometer to a true figure In this series most of the infusions were performed with the patient sitting up, but pressures were also checked with the needle still in place and the patient permitted to lie on her side The movement certainly is liable to tear a larger hole in the dura and for treatment is to be discouraged The glucose in saline solution was added fractionally, 5 cc at a time Pressure readings were taken after each injection

After the infusion, the patient rests on her back for about an hour This is done so as to avoid establishing a channel of flow through the dura Thereafter, she is permitted to be up and about Adler has observed that the eventual incidence of headache is not influenced by early ambulation after lumbar puncture [9] Perhaps we have false hopes that the dura hole may close fairly soon Mixter and Castro Silva point out that, at the time of operation when the dura was exposed, the hole could be identified six and even sixteen days after the tap [10 11] The headache runs a natural course of one to ten days, so probably the perforations close fairly soon With a small sharp needle the dural incision may close like a cut in a rubber tube and leave no hole at all Moreover, the restoration of spinal fluid is assisted by an increase in its production as the result of repeated or persistent drainage of fluid [12]

Results

All of the 14 patients treated had immediate and complete relief of pressure and pain This is apparently diagnostic If the headache is not relieved during the treatment, either the needle is not in place and should be checked, or else there is another cause Almost all the patients had satisfactory relief for the first twelve to twenty-four hours If they remain well for twelve hours after this time, cure is fairly certain One patient had full return of symptoms at this time, but the pain gradually subsided over the next three days This was the only patient in the series who rested on her abdomen after the treatment Perhaps this was just a coincidence Five may be considered immediate and complete cures Eight had return of headache from a 10 to 30 per cent degree for one to three days This trouble could be alleviated by aspirin, codeine, or amphetamine sulfate In no case was a new headache established

None of the cases tested seemed to be on the verge of a spontaneous recovery, so relief must be attributed more to the treatment than to a natural course of events An occasional patient would complain of pain in the legs or in the back if the fluid were injected too rapidly This would disappear immediately There were no other adverse effects noted immediately or later, including a six-week follow-up There were no significant variations in the blood pressure before or after treatment or from other patients who had spinal anesthesia A more detailed picture of results is portrayed in Table 1

TABLE 1.—TREATMENT

Patient	1	2	3	4	5	6	7	8	9	10	11	12	13	14
Age (years)	22	21	21	22	20	35	31	34	18	18	24	19	28	26
Duration of headache (days)	5	4	4	4	3½	3	4	5	3	3	8½	3½	3	3
Size of needle for treatment	22	22	22	20	20	22	22	20	22	20	23	22	22	22
Solution injected glucose (g), saline (s), water (w)	g/s	g/s	g/w	g/w	g/w	g/w	g/w	g/s	g/s	g/w	g/s	g/s	g/s	g/s
Amount of solution (cc)	10	12	10	15	16	20	20	20	20	20	20	15	20	20
Sitting (S) or recumbent (R)	R	R	S	R	S	S	S	S	S	S	S	S	S	S
Initial pressure (mm. of water)	0	0	190	90	0	155	185	160	130	110	175	65	150	200
Final pressure (mm. of water)	95	160	400	130	160	235	250	290	255	210	260	280	300	300
Total increase	95	160	210	40	160	80	65	130	125	100	85	215	150	100
Percentage of relief in 12 hours	100	100	100	100	100	100	60	80	100	100	100	90	50	100
Percentage of relief thereafter	100	100	90	95	85	95	10	100	70	80	100	90	75	100

Discussion

A total of 14 patients have received the infusion treatment None of them complained about the ordeal of the procedure itself All were anxious to try anything that might relieve their plight All felt that it was worth the inconvenience involved and certainly would like to have the same treatment if they had this type of headache again.

The five most complete results were with 5 per cent glucose in physiologic saline solution rather than just glucose in distilled water Perhaps this was due to a more hypertonic effect and the attraction of more fluid It was observed that there were no definite levels to which the spinal fluid pressure could be raised by a certain amount of fluid being injected The average increase of manometric level was 125 mm of water This included a 110-mm increase by 10 cc of glucose in saline and 65 mm by 20 cc glucose in water Exactly how much fluid is needed for relief is a question. Fifteen to twenty cubic centimeters seems to be an average amount needed to restore the pressure to near normal As little as 10 cc , however, has resulted in two complete cures with restoration of normal pressure from a level of zero This is in spite of the fact that the spinal subarachnoid space has a capacity of between 30 to 100 cc

Immediately, the question comes to mind, "If the fluid leaks from the first dural perforation, why does not another puncture just aggravate the problem?" In some it probably would, although this has not occurred in this small series In many cases this is hard to explain, especially in those patients who had a single perforation for anesthesia with a Number 22 gage needle In the treatment, however, we do take a great deal of care when performing the lumbar puncture Multiple perforations with a large needle are to be avoided. We elect to perform the infusion in the same interspace as the original feeling that in this locality the tissue repair work is already under way and the new hole will be closed sooner MacRobert suggested that the arachnoid may act both as a plug for the hole in the dura and as a wick facilitating the seepage of cerebrospinal fluid out of the canal into the epidural space [13] Thus variations in the behavior of the arachnoid at different times may account for headache at one time and no difficulty later The lumbar puncture is carried out with the patient sitting up because due to low pressure, too often no fluid will return when the patient is on her side This may result in repeated perforations and a poor result

We feel that, even though the series is small, the results are significant Certainly the treatment is not a 100 per cent cure, but usually it will help the distressed patient Apparently, the patient stands about a 30 to 40 per cent chance of being almost completely relieved and can be made no worse With proper care the injection of 20 cc of glucose-saline solution is no more hazardous than a spinal anesthesia and probably less so Moreover, it is a procedure that should be carried out on the rare patient who has a headache severe enough so that it promises to last The graph (Fig 1) illustrates that most headaches only last from one to three days. These can be overlooked The headache that is getting better can be treated with aspirin and codeine However the patient wants something done about the headache that persists and does not improve The procedure described in this paper offers these people an opportunity for relief

Summary

1 The high incidence of postlumbar puncture headache has been cited

2 The "leakage theory" of etiology is discussed

3 Replacement of the lost spinal fluid by intrathecal infusion is suggested as a means of relief of severe headaches

4 Good results in this small series of cases suggest further trial of this method

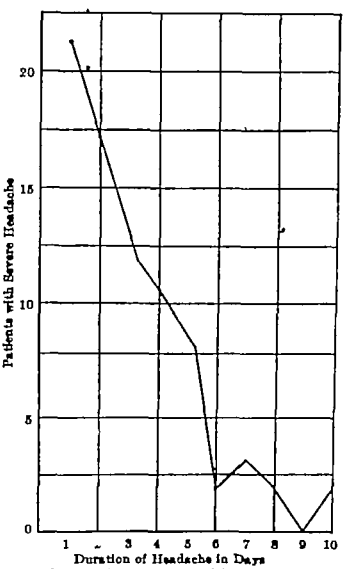


FIG 1 Graph of 79 patients with severe headache

5 In no case was the headache exaggerated nor did any complication arise

35 Riverside Drive

References

1 Ahearn, R E and Huston J W Am. J Obst & Gynec To be published
2 Weintraub F Antine W and Raphael A J Am J Obst & Gynec 54 682 (1947)
3 Myerson A Loman J and Dameshek W Am. J M Sc 192 560 (1936)
4 Jacobaeus H C and Frumerie K. Acta med Scandinav 58 102 (1923)
5 Kunkle E C Ray B S, and Wolff H. G Arch. Neurol & Psychiat. 49 323 (1943)
6 Davidoff L. M, and Dyke C G The Normal Encephalogram, Philadelphia Lea and Febiger 1946
7 Underwood L J Am. J Syph Gonor & Ven. Dis. 30 264 (1946)
8. Pickering G W Brit. M J 1 907 (1939)
9 Adler H New York State J Med 43 1328 (1943)
10 Mixter W J Arch Neurol & Psychiat. 28 956 (1932)
11 Koster H, and Weintrob M Am. J Surg. 8 1165 (1930)
12 Kehrer F Deutsche med Wchnschr 60 1949 (1934)
13 MacRobert, R. G J A M A 70 19 (1918)

FELLOWSHIPS IN CHILD GUIDANCE CLINIC PSYCHIATRY

The American Association of Psychiatric Clinics for Children is offering fellowships for training in child guidance clinic psychiatry under the auspices of the U S Public Health Service, the Commonwealth Fund, and some local funds The training is for positions in community clinics where psychiatrists, psychologists, social workers, and others collaborate in the treatment of children with emotional or mental illness Most of the fellowships are for two years, some for one The stipend is $3,000 for the first year, more for the second Prerequisites are graduation from an approved medical school, a general internship, and two years of general psychiatry

Opportunity is provided for the fellow to develop his own skills in an outpatient service with the support of a carefully planned training program and adequate supervision The training centers are selected on the basis of standards which have been established by the association, and the fellowships are awarded by a committee of this organization For information write Dr Abraham Z Barhash, executive assistant, the American Association of Psychiatric Clinics for Children, 1790 Broadway, New York City 19

NEW DIAGNOSTIC TESTS FOR WORM DISEASES

A new diagnostic test which will help toward better treatment of diseases afflicting hundreds of millions of people throughout the world was announced at the Congress of Tropical Medicine and Malaria in Washington, D C

The diseases are hookworm and the fluke-caused sickness called schistosomiasis The test would probably be effective for any disease in which worms or flukes get into the body and give off eggs It was devised by Drs Elmer H Loughlin, Samuel H Spitz, Richard H Bennett, and Jerome P Margolies of Long Island College of Medicine, Brooklyn

With this test, doctors will be able for the first time to tell exactly how many hookworms or blood flukes are in the patient's body He can then prescribe much more exactly the amount of medicine needed to free the patient of the worms or flukes, and get him well

The test also makes possible for the first time accurate diagnosis of these diseases in patients having only a light infection This will help many who come back from the tropics with a vague intestinal disorder that baffles the doctor and does not get better under ordinary treatment But with the new test, the doctor can find out exactly what does ail the patient and give a drug that will cure him

Schistosomiasis is found in Egypt, many Mediterranean countries, China, Japan, and the Philippines The flukes are carried by snails Humans get them from drinking or bathing in infested waters Some 85,000,000 persons throughout the world are afflicted with this condition and another 457,000,000 have hookworm, according to surveys based on previous tests for the disease But these tests only showed heavy infections If the light infections that can be detected by the new test were found, the total figures would be very much higher

One out of every three or four persons in the United States is probably carrying some kind of worm or fluke or ameba in his body, the Long Island doctors estimate They base this on the numbers they are finding in Brooklyn with their new test Many who have these worms and other parasites do not know it and may not even be sick But there is danger of their spreading the diseases, just as healthy carriers of typhoid germs can unknowingly spread that disease

Tests for the fluke and worm diseases all depend on finding the eggs in the intestinal wastes The new test concentrates the eggs, so that even if there are only a few, they will be detected Since it is quantitative, and since scientists know how many eggs a female hookworm, for example, will discharge in a day, the test gives the number of worms in the patient's body The shape, size, and structure of the eggs, seen under the microscope, tell which kind of worm or fluke the patient is harboring —*Science News Letter, May 22, 1948*

Case Reports

CAROTID SINUS SYNDROME

MILTON H MORRIS M D , Far Rockaway New York

(From the St. Joseph's Hospital)

THERE are many reflex phenomena associated with the cardiovascular system They have a regulatory and protective mechanism and are so delicately balanced that they create equilibrium and stability in the organism The carotid sinus reflex and its associated syndrome is the most common and the most thoroughly understood The wide distribution of its afferent and efferent pathways permits this reflex to present bizarre and diverse symptomatology referable to different organs and systems such as the brain the respiratory and gastrointestinal tracts and the heart. It is the resultant symptomatology and alteration of cardiovascular physiology that the following case emphasizes

Case Report

This patient (Case no 80110) was admitted to the St. Joseph s Hospital by ambulance He was found on the floor in a dazed condition and had considerable emesis

The patient's past history revealed an hernior rhaphy in 1939 He has complained of pain in the lower back for the past two years, a condition diagnosed by his physician as a 'spurred vertebra He also stated that he never wore a collar or tie as he felt weak and experienced peculiar feelings on the few occasions that he was so dressed

Following a restful night's sleep he attempted to put bundles in place He suddenly became dizzy perspired freely and vomited. He said that everything became blank, and it was in this condition of semiconsciousness that he was found by the ambulance surgeon and removed to the hospital

Physical examination—The patient was an adult man, 47 years of age His general body nourishment was poor He was dazed and not fully coherent. He would vomit bile at intervals. A complete neurologic examination was negative. Ophthalmoscopic examination showed a moderate degree of sclerosis of the retinal vessels. Both radial vessels were sclerotic. His temperature on admission was 98 F The pulse was regular 60 per minute, and of small volume. The blood pressure was 170/106 At the apex the heart sounds were of good quality, no murmurs were present. The aortic second sound was increased The lungs were clear The abdomen was negative. An emergency catheterized urine was negative The following day, an electrocardiogram was taken during which pressure was exerted to the right carotid sinus (Fig. 1) During this procedure the patient said he felt lightheaded. This was followed immediately by a period of complete unconsciousness, during which he experienced a left-sided clonic convulsion. There was a complete absence of heart sounds at the apex, and the radial pulse was not obtainable. When he regained consciousness he complained of a severe headache and felt weak, a condition which lasted a greater part of that day

X ray of the chest showed no pathologic changes in the lungs. The cardiac shadow appeared slightly rotated to the left and posteriorly The aorta was not widened X ray of the soft tissues of the neck showed no abnormal shadows. The cervical spine showed a moderate degree of hypertrophic osteoarthritis involving the lower four vertebrae, with narrowing of the disk between the sixth and seventh cervical vertebrae

The blood count showed 95 per cent hemoglobin, 4 930 000 red blood cells 12,800 white blood cells 86 per cent polynuclear neutrophils, 12 per cent lymphocytes, and 2 per cent monocytes. The sedimentation rate was 21 mm. in one hour

A urine specimen examined on the third day after admission was negative except for a trace of albumin

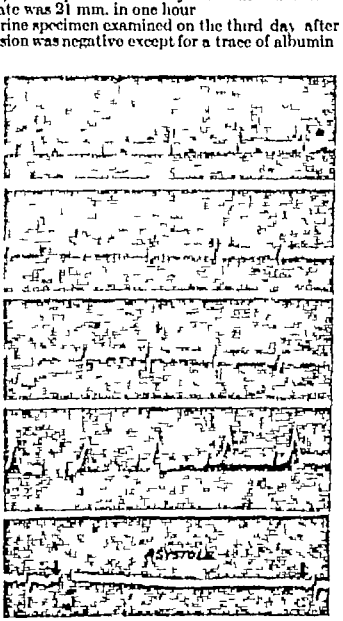


FIG 1 Standard limb leads and precordial lead Cf-4 Lead II shows an isoelectric T Carotid sinus pressure (right), applied in Lead III, shows complete asystole of over 4 seconds With the absence of heart beat the patient experienced unconsciousness and left-sided convulsion

Treatment—During the patient's stay in the hospital, he was given a diet of 1,500 calories daily, with feedings distributed four times a day He was instructed to remain in a reclining position and not to move his head unless necessary A daily soapsuds enema was given Belladonal (Sandoz), which is composed of 50 mg of phenobarbital and 0 25 mg of bellafoline, was given three times a day fifteen minutes before meals This regime has been followed for the past six months, while the patient has resumed his former occupation He has had no attacks during the period of dietary and medical routine There have been no signs of belladonna intoxication

Discussion—Since the original description of the activity of the carotid sinus by Hering, this common reflex has explained many symptoms and states in individuals who were classified as psychoneurotics and neurocirculatory asthenics Others were diagnosed as potential cardiacs or as having vascular instability of vasomotor origin Friedman described an anginal syndrome with a hyperactive carotid sinus, Weiss reports the occurrence of syncope and convulsions, Stern describes the abdominal manifestations of a sensitive carotid sinus [1-3] It also has been reported that artificial stimulation of the sinus is not without danger Askey reports ten cases of hemiplegia following stimulation of the sinus [4] Marmor records the occurrence of bilateral thrombosis of the anterior cerebral artery following artificial stimulation of the carotid sinus [5]

The above case is of interest in that it demonstrates the occurrence of diverse symptomatology referable to the heart, vasomotor system, the cerebrum, and the gastrointestinal tract Artificial stimulation by digital pressure over the right carotid sinus reproduced the clinical picture and, as recorded with the electrocardiogram, a period of complete cardiac asystole lasting over four seconds There also was recorded a disappearance of the heart sounds and arterial pulse tracing

The use of atropine and its derivatives in the treatment of the hyperactive carotid sinus is explained by the pharmacology of the drug Atropine causes an acceleration of heart rate due to blocking of vagal effects on the sino-auricular pacemaker Adequate doses of atropine not only remove the heart from normal vagal control but also prevent typical cardiac arrest from electrical stimulation of the vagus

The phenobarbital is used in conjunction with the atropine in that it is a general depressant to the central nervous system and, in raising the threshold to stimuli, prevents the occurrence of the reflex of which the carotid sinus is a part

Summary and Conclusion

1 A case of a hypersensitive carotid sinus and its associated syndrome is presented

2 The value of belladonna and phenobarbital for the relief of the condition is suggested.

3 The diagnosis of the carotid sinus syndrome depends on the spontaneous occurrence of the syndrome and the ability to reproduce the clinical picture by artificial stimulation of the sinus

4 The above case is of interest in that it presented a vagal, depressor, and cerebral reaction of the sinus

5 It is suggested that further study of the carotid sinus reflex and other vascular reflexes may demonstrate that they may not only alter normal physiology but may cause permanent pathologic states in the cardiovascular system

References

1 Friedman, M Am Heart J 29 37 (1945)
2 Weiss, S O, Capps, R B Ferris, E B, and Munro, D Arch Int Med 58 407 (1936)
3 Stern, J E J A M A 110 1986 (1938)
4 Askey, J M Am Heart J 31 131 (Feb) 1946
5 Marmor, J, and Saperstein, M R J A M A 117 1089 (1941)

TRAINING FELLOWSHIPS IN PUBLIC HEALTH EDUCATION OFFERED

Fellowships for graduate study in public health education, previously administered by the United States Public Health Service, are now being administered by the National Foundation for Infantile Paralysis Fellowships amount to $100 a month, plus tuition, as well as certain fees and transportation, in connection with field work. Partial fellowships are available to veterans to supplement amounts for maintenance under the G I Bill of Rights

Applicants must be between the ages of 22 and 40, inclusive, must be citizens or must have applied for citizenship Also required is an A B or B S degree plus some additional qualifications such as a master's degree, three years' experience in the field of public health or an allied field, or other evidence of special interest State and local health department employes are not eligible

Students accepting fellowships must agree to complete the school year, and, in addition, three months of field training, and accept employment in the United States or its territories

Candidates should write for application blanks to Credential Secretary, Division of Professional Education, National Foundation for Infantile Paralysis, 120 Broadway, New York City 5

UNUSUAL REACTION TO THIOURACIL

IRVING GREENFIELD M D , F A C P , Woodmere, New York

(*From the Long Island College of Medicine*)

INDISCRIMINATE condemnation of a therapeutic agent or procedure because of toxic or untoward reactions to its use is not indicated Instead knowledge of these reactions should be recorded so they may serve as a cautionary guide in the proper use of the form of therapy The purpose of this communication is to add an unusual reaction to thiouracil to the literature which already contains reports indicating that the administration of this antithyroid agent is not without some danger

Case Report

For a period of approximately three years prior to the time when this 30-year-old white woman came under observation she complained of progressively increasing nervousness, intolerance to heat and cold and restlessness Notwithstanding a large appetite there was progressive weight loss Tremor of the fingers was noted Subsequently she reported that her body temperature appeared warmer than it had been. On several occasions however rectal temperatures were normal She further observed that during the cold winter months she required less protective outer clothing as well as less bed covering than previously More recently, progressively increasing tendency to fatigability palpitation, paroxysms of choking, excessive perspiration, emotional instability and sleeplessness with frightening dreams were added to the clinical picture

The pertinent findings on physical examination were as follows. The weight was 105 pounds and the height 60 inches The blood pressure was 120/60 She was extremely high strung and agitated. The Stellwag, Moebius and von Graef signs were present. The conjunctivae were unusually bright. The skin was warm and silky There was moderate exophthalmos. The thyroid gland was slightly enlarged and granular Active pulsations were present over the superior thyroid vessels, and a bruit was audible bilaterally A fine tremor of the extended fingers was noted The skin of the axillae as well as of the palms of both hands, was wet with perspiration. Other than the presence of a tachycardia the remainder of the examination was normal.

Laboratory data were as follows hemoglobin 80 per cent, red blood cells 4 724,000 white blood cells, 8,250 polymorphonuclear leukocytes 61 per cent lymphocytes, 38 per cent and transitional cells 1 per cent. The urine was chemically and microscopically normal The blood urea was 18.7 mg. per cent, sugar 74 mg. per cent, and cholesterol 237 mg. per cent. The electrocardiogram revealed a sinus tachycardia. There were no abnormalities of the P waves the ventricular complexes, or the T waves. A teleoroentgenogram was normal The basal metabolic rate was plus 52 per cent.

The patient received 125 mg. of thiouracil daily in divided doses The response was dramatic. Within five days the tremor had diminished considerably The nervousness subsided The attitude of the patient was now one in which she appeared relaxed and calm.

The laboratory data kept pace with the change in the clinical picture The basal metabolic rate was now plus 23 per cent She gained two pounds. The white cell count was 8 700 with a differential of 46 per cent polymorphonuclear leukocytes 42 per cent lymphocytes 9 per cent monocytes and 2 per cent eosinophils The therapy was maintained, and after ten days the white cell count dropped to 7 400 The differential count remained essentially unchanged The blood cholesterol was 201 mg. per cent and the basal metabolic rate plus 19 per cent. The patient was then discharged from the hospital after she had taken a total of 12 5 Gm of thiouracil Her condition had improved considerably Because of the slight drop in the total white cell count the dosage of the thiouracil was diminished to 75 mg. in divided doses daily On discharge the usual effects of the thiouracil were evident. The exophthalmos was more prominent. The fullness of the neck was more noticeable and the thyroid gland was more granular

Three days after her arrival at home the following additional history was obtained. Approximately one week after the start of the thiouracil pruritis of the palms of the hands was noted At first it appeared only at night and was present for a brief period of time. Therefore, no mention was made concerning it. The pruritis gradually involved larger areas so that after an interval of two weeks it became universal. Large doses of hypnotics were required to keep the patient from scratching the pruritic areas until they bled. The antithyroid drug was discontinued. A blood count at this time revealed essentially the same findings noted previously The blood contained no demonstrable reagins. The pruritis was obstinate and resisted all therapy for three weeks. It then subsided gradually but by that time the symptoms of thyro-intoxication reappeared. At this point propyl thiouracil* was given. Tolerance to this drug was excellent, and the hyperthyroidism was adequately controlled.

Discussion

There are several points of interest in this case report which can be emphasized. On the tenth day following the institution of thiouracil therapy the white blood cell count dropped perhaps not significantly but nevertheless it did drop There was no significant change in the differential count. In spite of the fact that the change was slight the dosage of the thiouracil was diminished. Careful inquiry subsequently revealed that the pruritis made its onset at approximately the time when the drop in the leukocyte count occurred. When the pruritis became universal it was of interest to note that there were no objective cutaneous allergic manifestations other than the scratch marks At the height of the pruritis and again at a subsequent date, the blood contained no reagins to thiouracil. Under this regime it was of interest to note the reciprocal relationship of the basal metabolic rate to the level of the blood cholesterol

The role which the MacKenzies and Astwood played in calling attention to the use of thio-urea is well known.[1,2] These observers showed that, following its use, the thyroid gland underwent hyperplasia, the basal metabolic rate fell, the anterior lobe of the pituitary gland underwent changes similar to those noted following thyroidectomy, and iodine was ineffective in counteracting these changes Astwood subsequently reported concerning the use of thio-urea and thiouracil in the treatment of hyperthyroidism[3] Since then, much useful data concerning the untoward and toxic reactions to this chemical have accumulated Gabrilove and his coworkers encountered untoward reactions in 31 per cent of 54 patients whom they treated[4] Barr and Shorr abandoned the use of thiouracil in the treatment of nine of the group of 100 patients because of unfavorable reactions which they attributed to the drug[5] Thiouracil was also discontinued in 7 2 per cent of the 246 cases treated by Williams[6]

The recorded unfavorable reactions lend themselves readily to division into two groups There were those unfavorable reactions which, although they were attributable to the chemical, were not considered contraindications to the continued use of the drug Into this group were such reactions as conjunctivitis, edema, dizziness, and generalized pains and aches The second group consisted of those unfavorable reactions which were serious enough to be considered contraindications to the continued use of the antithyroid agent Into this group fell the drug fevers, with and without the rashes, agranulocytosis, and leukopenia In addition to these later untoward reactions, Di Palma and Ma Govern noted the occurrence of nocturnal dyspnea and in one patient symptoms which suggested coronary artery occlusion Water retention and myxedema were noted following the administration of thiouracil[5-7]

A survey of the literature has failed to reveal any reaction to thiouracil similar to that recorded in this communication[8] It is for this reason that this presentation is added to the growing literature on the subject

Summary

Generalized pruritis, heretofore unrecorded in or during thiouracil administration, is noted Attention is again directed to another chemical capable of producing untoward reactions but to which reagins have not as yet been demonstrated in the blood

799 CENTRAL AVENUE

References

1 MacKenzie C G and MacKenzie J B Endocrinology 32 185 (1943)
2 Astwood E B Sullivan J Bissel A., and Tyslowitz, R Endocrinology 32 210 (1943)
3 Astwood E B J A M A 122 78 (1943)
4 Gabrilove J L Kurt M J and Soffer L J Ann Int Med 23 537 (1945)
5 Barr D P and Shorr E Ann Int Med 23 754 (1945)
6 Williams R H Clin. Endocrinology 6 (1946)
7 Di Palma J R and Ma Govern J J Am Heart J 32 494 (1946)
8 Hardy, S M Personal communication.

* The propyl thiouracil was furnished by Dr S M Hardy of the Lederle Laboratories Pearl River New York

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ASPIRATION OF BONE MARROW FROM THE ILIAC CREST

Dr Michael A Rubinstein of the Montefiore Hospital, New York City, described at a meeting of the New York Academy of Medicine the advantages of the iliac aspiration technic versus the sternal technic

These are, he said, safety, as no serious injury can be sustained by any underlying organ, ease, the procedure usually being less painful, and the patient being less apprehensive than when subjected to a puncture in the cardiac area, repeated aspirations iliac crest puncture can easily be performed at frequent intervals at both sides of the body, and is, therefore, very suitable for serial bone marrow studies Moreover, the bone marrow cavities of the iliac crest can occasionally be used as a route of administering fluids into the general circulation when no intravenous route is available, and may perhaps allow for greater safety than the sternal technic

Some disadvantage of iliac aspiration is occasional difficulty in puncturing the bone which at times may prove to be exceedingly hard The cells of the iliac bone marrow have been studied for the past four and a half years in about 1,000 different cases showing normal and pathologic findings In about 300 of these instances, simultaneous sternal marrow studies were also performed

The normal values of the iliac bone marrow, the total cellular count, as well as the cell distribution, were found to have approximately the same range as those determined for the sternal aspiration Normally the iliac crest contains hemopoietically active bone marrow in all age groups studied (age range 16–18 years)

In most of the cases studied the findings from both sources run parallel, and the iliac marrow presents the characteristic picture of the disease as seen in the sternal aspiration However, in certain instances the iliac aspiration has proved of distinct diagnostic advantage, as compared to the sternal aspiration alone.

DYSTROPHIA MYOTONICA COMPLICATED BY THROMBO ANGIITIS OBLITERANS AND PSEUDOHYPERTROPHIC MUSCULAR DYSTROPHY

IRVING LEINWAND, M D , New York City

(From the Division of Peripheral Vascular Disease Department of Medicine New York Post-Graduate Medical School and Hospital)

IN THE literature on dystrophia myotonica or myotonia atrophica as it was previously called there are many instances of patients who had difficulty in walking In practically all of these cases this was attributed to involvement of the quadriceps femoris and the dorsiflexors of the foot with consequent "foot drop and inability to raise the leg In no case was there a history of intermittent claudication that is inability to walk more than a given distance at a time without production of a cramp-like pain in the calf muscles. The incidence of dystrophia myotonica is probably much greater than is commonly accepted since as Waring and his coworkers pointed out the disease is most likely to be first recognized where it appears in an earlier generation rather than at a later age.[1]

Since the disease affects the muscles so dramatically and the symptoms produced overshadow most others it is probable that the vascular system in most instances received no more than a cursory examination. For this reason the following case is presented

Case Report

This 48-year-old man was first seen in the clinic on February 13, 1940 He complained of a cramp-like pain in the right foot and calf produced by walking. He could walk no more than one city block without being compelled to stop because of pain This pain was relieved by rest. The complaint had been present for three and one-half years previous to his clinic admission For the past four years the patient had had generalized progressive muscular weakness most evident in the extremities. His only other complaints were occasional epigastric distress and fairly constant difficulty in swallowing. He had smoked a package of cigarets daily for over twenty years The past history was noncontributory

Family History.—There was no history of any similar disease in the preceding two generations. There was no cataract in either of the parents. His mother died of cancer type and site unknown His father died of heart disease, type unknown. The patient had an eleven-year-old son who was apparently normal except for genitalia which were small and definitely underdeveloped

Physical Examination.—The patient presented a thin mask-like face poor posture was partially bald and wearing glasses He could not lift himself up on the examining table with his arms He could not stand up straight nor rise from the supine position. The pupils were equal and regular reacted to light and accommodation Fundi were negative

The heart disclosed a regular sinus rhythm apex beat in the fifth interspace in the midclavicular line No murmurs were heard, and the sounds were clear Blood pressure was 110/70

There was no abdominal tenderness or rigidity no palpable masses and liver kidneys, and spleen were not palpable There was marked lumbar lordosis with thoracic scoliosis.

The hand grip was poor He could not compress the bulb of the ordinary sphygmomanometer The muscles of the upper extremities were moderately atrophied and flaccid The calf muscles of both legs were enlarged and firm.

No genital abnormalities were noted other than small testicles

The gait was on a broad base. The cranial nerves were not involved All of the deep reflexes of the upper and lower extremities were diminished and produced only with reinforcement There was marked weakness of all the muscles of the back and of the sternocleidomastoid muscles. No abnormal reflexes were present

Pulsations were obtained in all the major vessels in the left leg and in the upper extremities. In the right leg there was no pulsation noted below that of the femoral artery in the femoral triangle Oscillometric readings were as follows (1) maximum of $^1/_2$ degree in the left foot none in the right; (2) maximum of $2^1/_2$ degrees in the left leg above the ankle maximum of $^1/_2$ degree in the right and (3) maximum of $4^1/_2$ degrees below the knee in the left leg maximum of $^1/_2$ degree in the right.

This patient had been seen by a neurologist in November 1937 three years before he came to this clinic. Examination at that time revealed the following There was no deformity of the spine There was marked weakness of the upper extremities. The patient was unable to open the fists readily after closing them There was definite indentation on percussion of the tongue. Both calves were markedly hypertrophied with not much weakness The diagnosis at that time was myotonia atrophica complicated by pseudohypertrophic muscular dystrophy

Two years later a biopsy of the gastrocnemius was performed in another hospital There was evidence of degeneration of the muscle fibers but the histologic picture was not typical of any disease

Laboratory Studies.—On May 8 1940 the Wassermann (blood) and urinalysis were negative The basal metabolic rate was minus five The cholesterol was 220 mg per cent, and the esters were 105 the ratio being 48 per cent. The true glucose measured 65 per cent. The inorganic phosphate was 3.2 mg. per cent and the calcium was 10 1 The urea clearance test was 126 per cent after the first hour and 116 per cent after the second hour

The results from the electrocardiogram were as follows The rhythm was regular The PR interval was 0 16 second, and the QRS interval was 0 12 second. There was left axis deviation, intraventricular block and T_3 was inverted. The electroencephalogram showed changes suggestive of atrophy of the cortex.

The Landis test (to measure vasodilatation of the peripheral vessels in the right foot) showed no rise in temperature at the end of two hours.

Biopsy of the right calf and back on May 15 1940, showed an increase of mesothelial cells at the point of union of the muscle with fascial bundles. No histologic diagnosis was possible

Course and Treatment.—As a control for future

therapy, the patient was given normal saline (2 cc) intramuscularly once weekly for eight weeks During this time the patient was not allowed to smoke No other therapy was given There was no improvement during this period The patient was then given whole wheat germ oil and vitamin B complex, one dram of each, three times daily He continued this for two months with little change in his status

Previous to his treatment in this clinic the patient had received a variety of therapeutic agents, including quinine, glycine, and creatinine, without relief Prostigmine bromide, 15 grains three times daily, was given him for a short period in this clinic without effect At the end of this time he was given 50 mg alpha tocopherol acetate* together with whole wheat germ oil and vitamin B complex, two drams daily

In the following two months, the patient improved to such a degree that he was able to walk as much as five miles Readings taken at that time revealed no improvement in the degree of oscillation of the involved arteries The calf muscles, however, had softened and appeared smaller in size and more normal in consistency This improvement in the lower extremities was maintained, but his upper extremities remained unaffected During this last period, the patient developed fairly persistent pain of the rheumatic type in the left wrist which resisted therapy In view of the baldness, hypotension, and subnormal secondary sex characteristics, testosterone proprionate,** 25 mg twice weekly, was finally added to his treatment

Re-examination Seven Years Later —In January, 1947, seven years after his first admission to the clinic, examination revealed the following

His dystrophia myotonica had progressed This progress, although markedly apparent, did not completely incapacitate the patient He had difficulty in dressing, and his posture was much less erect He could not close his fist There were no changes in vision In the four-year period that the patient was absent from this clinic, he received treatment elsewhere This treatment included all of the usual therapeutic measures for this disease He stated, however, that he did not feel as well with any other therapy as he did with treatment in this clinic, namely, vitamins B and E and testosterone propionate At the present time he can walk twenty blocks compared to the half block, seven years ago The distance is apparently limited by fatigue of the muscle rather than pain Oscillometric readings (on the same instrument) revealed no change An electrocardiogram revealed the identical abnormalities present seven years ago An electroencephalogram revealed a normal tracing as compared to an abnormal tracing seven years ago It is worthy of note that his son is now fully grown and completely normal

Discussion

In the treatment of thrombo-angiitis obliterans, it is common belief that any form of therapy is useless if the patient continues to smoke This is so true that, if a patient with a mild degree of Buerger's disease stops smoking, his symptoms will usually improve within one to four weeks without any form of therapy It is interesting, therefore, to note that this patient did not improve after eight weeks of not smoking in his first control period After eight more weeks of small doses of whole wheat germ oil, he showed only slight improvement, if any Since the first real improvement was after the administration of the alpha tocopherol acetate, it is felt that the improvement in the lower extremities was probably due primarily to this form of therapy It was also noted that the calf muscles assumed a more normal appearance following this treatment

The thrombo-angiitis was not treated directly in that no attempt was made to increase the flow of blood to the extremity It would thus seem that the improvement in his walking capacity was due to changes in the musculature, rather than to changes in the arterial supply One cannot rule out better collateral circulation secondary to the cessation of the use of tobacco, even though a control period of observation was included. There have been varying reports in the literature regarding efficacy of vitamin E therapy in the treatment of the muscular dystrophies In this particular case, it would seem that the pseudohypertrophic muscular dystrophy may have responded to this form of therapy, and the dystrophia myotonica remained unaffected There has been a recent report in which four of nine patients with pseudohypertrophic muscular dystrophy showed objective improvement on treatment with vitamin E Testosterone proprionate has been reported to be of therapeutic value by several investigators [1 2] Papanicolaou and Falk reported the production of muscular hypertrophy in guinea pigs with use of the androgen [3]

Evidence of vascular disease in this patient was generalized. There were abnormal findings in the electrocardiogram, electroencephalogram, and the oscillometric readings of the right lower extremity Changes in the electrocardiogram have been reported by several investigators [1 4 5] There is also a report in the literature of a case of dystrophia myotonica with scleroderma, a disease which is also associated with marked vascular changes It was noted by Waring and his group, in a study of 13 patients that ten complained of cold hands and feet with cyanosis of varying degrees [1] After a review of the recent reports and an evaluation of this patient, it would seem that vascular disease may be more closely related to this disease than has been previously noted. It is possible that there have been other cases of obliterative arterial disease which have gone unnoticed, because the onset of fatigue in the atrophied muscle prevented sufficient exercise to produce true claudication

We made a clinical diagnosis of thrombo-angiitis obliterans in this patient on a basis of organic arterial disease beginning in a man about 45 years of age, without evidence of arteriosclerosis He had been a heavy smoker of tobacco It is possible, however, that we may have been dealing with an arteritis with occlusion of an unknown nature Finally it would seem by comparison between the findings today and that of seven years ago, that there was no progress of the vascular disease Since there was no apparent improvement in circulation in the impaired leg, the improvement which was apparent seven years ago, and still existed, was prob-

* Ephynal Acetate was provided by Hoffman-La Roche.
** Perandren was provided by Ciba Pharmaceutical Company

ably due to improvement in the musculature of the lower extremities.

Summary

1. A patient with muscular vascular disease is presented.

2. Vitamin E therapy improved the patient's pseudohypertrophic muscular dystrophy but did not affect the dystrophia myotonica. Many other forms of therapy were tried previously without relief.

3. It is suggested that vascular disease may be an intimate part of the disease, dystrophia myotonica.

The clinical picture in this case of the vascular disturbance is that of thrombo-angiitis obliterans.

14 East 65th Street

I wish to express my appreciation to Dr. A. Wilbur Duryee for his suggestions in the preparation of this paper.

References

1. Waring, J. J., Ravin, A., and Walker, C. E.: Arch. Int. Med. 65: 763 (1940).
2. Slauck, A.: Verhandl. d. deutsch. Kong. f. Inn. Med. 45: 175 (1933).
3. Papanicolaou, G. N., and Falk, E. A.: Science 87: 238 (1938).
4. Guillain, G., and Rouques, L.: Ann. de méd. 31: 158 (1932).
5. D'Antona, L.: Minerva med. 1: 833 (1935).

DELAYED REACTION TO PENICILLIN TREATED WITH THEPHORIN

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(From the Skin and Cancer Unit, New York Post-Graduate Medical College)

VARIOUS allergic reactions following the employment of penicillin orally locally, and parenterally have been reported.[1-5] These reactions usually follow the continuous use of the preparations. We are reporting the following case because of the fact that it occurred in a patient who only received one injection of 300,000 units of penicillin suspended in beeswax and peanut oil. The patient presented no clinical evidence of fungus infection. The patient was treated with thephorin,* a new antihistaminic drug, 50 mg. every four hours by mouth with no local therapy. Complete recovery took place in a period of five days. The formula for thephorin is 2-methyl-9-phenyl-2,3,4,9-tetrahydro-1-pyridindrene hydrogen tartrate.

Case Report

A. F. S., a white man, age 38, weight 210 pounds, was referred for the removal of a sebaceous cyst of the cheek on November 28, 1947. The patient gave no history of any serious medical or surgical disease and no history of any allergy or dermatologic disease. The sebaceous cyst, the size of a small olive, was removed from the right side of the cheek over the malar region by means of the Danna electrocoagulation method and the lesion was dressed.[7]

The patient was seen several times for postoperative treatment. On December 5, 1947, he presented a mild secondary infection of the operative area. He was given 300,000 units of penicillin, suspended in beeswax and peanut oil, deeply in the right buttock in the upper and outer quadrant. The penicillin used was the crystalline G penicillin which does not require refrigeration or heating.

When the patient returned for follow-up treatment on December 12, 1947, he complained of severe pain in the right buttock and an itching rash. Examination revealed a diffuse erythematous maculopapular rash involving the face, chest, back, and upper and lower extremities. There was no evidence of any scaling. The right buttock revealed an area of about 5 by 5 inches that was markedly erythematous, swollen, indurated and painful. The center of this area was a little more reddened which evidently was the point of the entrance of the needle. Patient was given thephorin 50 mg. every four hours by mouth for a dose of 200 mg. per day for a period of five days. On December 12, 1947, when the patient returned for examination, the lesions had completely healed, and there was just a small area of redness involving the right buttock.

The patient returned one week later, December 22, 1947, and the infection of the postoperative area was healed. It was decided to determine whether sensitivity to tricophytin and oidomycin existed, and intracutaneous tests of 0.1 cc. of 1:10 tricophytin and 0.1 cc. of 1:40 oidomycin were used with controls. The patient returned in forty-eight hours and seventy-two hours, and no evidence of postoperative reaction was observed. He was then discharged on December 26, 1947, in apparently good health.

Conclusion

We present a patient who had never previously received any penicillin either orally, locally, or by injection and who seven days after intramuscular injection of penicillin in oil and beeswax, 300,000 units, suffered a severe diffuse erythematous maculopapular eruption and a marked area of induration and swelling at the site of inoculation.

Symptoms completely disappeared after the fifth treatment with thephorin, consisting of 200 mg. per day. The reaction was negative to the intracutaneous tests with tricophytin and oidomycin.

References

1. Macey, H. B., and Hays, T. G.: U.S. Nav. M. Bull. 45: 1143 (Dec.), 1945.
2. Lyons, C.: J.A.M.A. 123: 1007 (Dec. 18), 1943.
3. Crisp, L. H.: *Ibid.* 126: 429 (Oct. 14), 1944.
4. Morris, G. E., and Downing, J. G.: *Ibid.* 127: 711 (Mar. 24), 1945.
5. Lamb, J. H.: Arch. Dermat. & Syph. 52: 93 (Aug.), 1945.
6. Kolodny, M. H., and Denhoff, E.: J.A.M.A. 130: 1063 (Apr. 20), 1946.
7. Danna, J. A.: New Orleans M. & S. J. 98: 5 (1945).

* Thephorin, Roche brand of phenindamine, supplied by R. J. Floody, M.D., of Hoffman-La Roche, Inc.

CONGENITAL ABSENCE OF THE GALLBLADDER WITH OBSTRUCTIVE JAUNDICE DUE TO A SOLITARY GALLSTONE

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(From the First Surgical Division, St Vincent's Hospital)

CONGENITAL absence of the gallbladder is a rare anomaly Interest in this condition is further increased by the presence of a gallstone in the common hepatic duct, causing repeated attacks of obstructive jaundice A case embodying these features is reported

Case Report

A woman, born in Italy, aged 70, was admitted to St Vincent's Hospital, New York City, June 18, 1947 Twelve hours before admission, the patient experienced a sudden attack of severe pain in the right upper quadrant of the abdomen, accompanied by vomiting The pain and vomiting persisted until the time of admission There was marked language difficulty, but in spite of this, a history of recurrent colic in the left upper abdominal quadrant was obtained. These attacks were accompanied by nausea and vomiting

Physical Examination.—The temperature was 102 F , pulse 88, respiration 24, and the blood pressure was 120/80 mm The white blood count was 14,000 with 85 per cent polymorphonuclear leukocytes The abdomen was scaphoid, and no masses could be felt Muscle spasm and tenderness were present in the right upper quadrant

The preoperative diagnosis was acute cholecystitis with cholelithiasis

Course.—Operation was performed under general anesthesia using pentothal sodium, cyclopropane sequence Through a right subcostal incision, the undersurface of the liver was exposed. Many adhesions between the liver, duodenum, and surrounding structures were separated An intensive search was made for a gallbladder None was found Operation was discontinued after one hour because of the increasingly poor condition of the patient

Jaundice became manifest after operation On the fifth postoperative day the serum bilirubin was 8 7 mg per 100 cc of blood The postoperative course was stormy The pulse rate was elevated, and the temperature, which ran a septic course, subsided on the thirtieth postoperative day In reviewing the postoperative course, the type of fever, and the jaundice, the general clinical picture was consistent with that seen in a common duct stone with cholangitis

On August 9, 1947, the patient was readmitted to the hospital She complained of epigastric pain Examination of the abdomen revealed moderate generalized rigidity and tenderness that was most marked in the subcostal region The following is to be noted on the subsequent dates August 12, 1947, moderate clinical jaundice, August 13, 1947, serum bilirubin 7 3 mg per 100 cc of blood, August 14, 1947, the gallbladder x-ray series with contrast dye, ordered before jaundice was recognized, revealed no gallstones and no visualization of the gallbladder, August 18, 1947, a diagnosis of chronic cholecystitis with a common duct stone was made, August 19, 1947, serum bilirubin 2 5 mg per 100 cc of blood, and August 23, 1947, serum bilirubin 1 8 mg per 100 cc of blood On August 27, 1947, operation was again performed under general anesthesia

Findings.—There was a mass of adhesions involving the stomach, small intestine, falciform ligament, and duodenum to the inferior surface of the liver The dissection was made through a long, right paramedian incision The right and left lobes of the liver and its inferior surface were exposed The position of the organs showed that the anomaly of situs inversus did not exist Careful examination of the undersurface of the liver failed to reveal a gallbladder The foramen of Winslow was entered, and the pulsation of the hepatic artery was felt A thickened and enlarged white common hepatic duct was seen, and, within it, a freely movable stone was felt An incision was made into the common hepatic duct, and a round gallstone, 1 5 cm in diameter, was removed Free-flowing yellow bile was obtained The ducts were probed, and a T-tube was sutured into the common hepatic duct

On September 3, 1947, and on September 10, 1947, cholangiograms (Fig 1) were taken which did not demonstrate either an extrahepatic or an intrahepatic gallbladder or remnant of cystic duct The postoperative course was uneventful, and on the twenty-second postoperative day, with the T-tube *in situ*, the patient was discharged and asked to return to the outpatient department

121 EAST 60TH STREET



FIG 1 Cholangiogram. Dilated common duct injected with Diodrast through a T-tube, after the administration of morphine to contract the ampulla A small amount of dye entered the duodenum through the ampulla of Vater

FRIEDLANDER BACILLUS PNEUMONIA TREATED WITH STREPTOMYCIN

JOHN H KEATING JR M D , New York City

(From the Medical Service of St. Luke's Hospital)

SINCE the introduction of streptomycin, there has been new hope in the treatment of pneumonia due to the organisms of the Friedländer group (Klebsiella) The incidence of pneumonia whose causative agent is a member of this group has been reported to be 0 6 to 1 5 per cent of all pneumonias the mortality rate being 84 to 97 per cent.[1 2]

Streptomycin was first shown to be of value in the treatment of Klebsiella pneumoniae infections in 1945 and the first clinical usage was reported later that year.[3 4] However, it was not until 1946 that there was a published case of Friedländer pneumonia treated successfully with streptomycin.[5]

Until the present time, only four additional cases have been reported.[6 7] One of these was, necessarily, inadequately treated because of the appearance of a toxic reaction presumably due to streptomycin, and another case is reported in which it appears doubtful that the primary disease was pneumonia due to organisms of the Friedländer group There is also the report from the National Research Council of 17 cases of acute or chronic pulmonary infections associated with these organisms but a breakdown is not given as regards the percentage of the cases which were primary Friedländer pneumonia.[8 9]

The results of this new form of treatment are somewhat equivocal as to its efficacy It seems therefore pertinent to report another case of primary Friedländer pneumonia treated with streptomycin

Case Report

E K. a 76-year-old, unemployed white Finnish man was admitted to the hospital in November 1947, with the chief complaint of chest pain of four days' duration.

Until the onset of the present illness the patient had no history of any other serious illness injury or operation He stated that for several years he had consumed one to two quarts of beer plus a moderately large intake of whiskey daily but there was no history of unconsciousness due to alcohol During this same period his diet had been inadequate and he relied almost exclusively on meat.

Six days prior to admission he developed an upper respiratory infection, and two days later he had the onset of chills and fever accompanied by a cough productive of a moderate amount of purulent sputum. On the following day there appeared left chest pain on deep breathing and coughing All symptoms persisted until the patient sought medical treatment on the sixth day of his illness

At the time of physical examination he appeared acutely ill slightly cyanotic, and emaciated. He was breathing rapidly and his skin was hot and dry Rectal temperature was 100 pulse 110 respirations 28, and blood pressure 140/80 The left ear drum exhibited definite fullness and was markedly injected in the region of Shrapnell's membrane and along the malleus. No mastoid tenderness was elicited. The tongue was dry and magenta in color with smooth edges, and the throat was red with purulent, stringy exudate The thorax exhibited limited left-sided expansion and there was flatness to percussion over the lower two thirds of the left posterior chest which extended around to the left anterior axillary line. In this area were increased vocal and tactile fremitus and bronchial breathing Coarse rales were heard in the region of the left anterior axillary line. The right lung and heart appeared normal, as did the remainder of the physical examination with the exception of marked peripheral sclerosis of the blood vessels.

On the first hospital day the patient's hemoglobin was 14 5 Gm., white count 6 100 with polymorphonuclears of 84 per cent, lymphocytes 16 per cent and with a slight shift left. On the second day the white count was 5 000, of which 80 per cent were polymorphonuclears 18 per cent lymphocytes and 2 per cent monocytes. On the fourth day there were 10 700 white cells with 92 per cent polymorphonuclears, the remaining 8 per cent being lymphocytes The blood count remained at this level until the eighth day and then gradually returned to normal by the twelfth day Urinalysis on admission and those done subsequently were normal as were the blood chemistry studies. Blood serology was negative and the sedimentation rate was 15 mm per hour Electrocardiogram was within normal limits except for a moderate left axis deviation. The admission x ray of the chest showed a dense area of pneumonic consolidation occupying the entire lower outer half of the left lung field with extension into the retrocardiac area A less dense area of pneumonic infiltration was seen in the mid- and outer portions of the left lung field

Treatment was instituted with various supportive measures and with an intramuscular penicillin regime. The patient however received but one injection as a preliminary report was received from the laboratory that the sputum smear showed only 4 plus Friedländer's bacilli. Penicillin was stopped, and streptomycin intramuscularly was started. It was administered for a total of 2 Gm. daily in divided doses of 0.25 Gm. every three hours. In conjunction with streptomycin, he was given sulfadiazine 1 0 Gm. and sodium bicarbonate 2.6 Gm. every four hours

The initial bacterial culture of sputum was reported as a practically pure culture of Friedländer's bacilli Specific typing sera for the Friedländer group were not available. Repeated blood cultures were negative

On this regime the patient's temperature which ranged between 100 and 102 F reached a normal level on the fifth hospital day Sputum cultures became permanently negative for Friedländer's bacilli on the third day However at this time there first appeared a hemolytic streptococcus and Staphylococcus aureus. X ray of the chest on this third day showed no change as compared to the admission film. Likewise, there was no change in the physical signs of the chest, and examination of the ears showed them to be negative

By the eighth hospital day, after patient had been afebrile and without oxygen for three days, the chest x ray showed partial resolution of the pneumonic process but multiple radiolucent areas were seen in the lower left lung field On auscultation bronchial breathing was not heard but a friction rub was aud

ible in the left axillary line Despite the improved x-ray and clinical findings, the patient on this day had the onset of a daily temperature rise to 101 and 102 F

On the thirteenth hospital day, penicillin treatment was started in a dose of 50,000 units intramuscularly every three hours Sulfadiazine was halted. Within twenty-four hours his temperature began to subside, and from his fifteenth hospital day he was afebrile Streptomycin was stopped on the sixteenth day after a total dosage of 30 5 Gm , and penicillin was stopped on the twentieth hospital day with a total of 2,800,000 units having been administered No sign of streptomycin toxicity was noted

X-ray of the chest on the fourteenth day showed further resolution of the pneumonic process with a few highlights suggestive of lung necrosis with cavitation On the twenty-fifth day the x-ray was interpreted as showing considerable fibrosis throughout the lower two thirds of the left lung but no evidence of cavitation or necrosis.

The patient was allowed up on the twentieth day and discharged on his thirty-first hospital day Physical examination of the chest at this time was negative except for a few scattered rales in the region of the left base

Comment

It will be noted when bacteriologic diagnosis was made that the initial penicillin regime was stopped, as the published results with its use have been uniformly poor, except for one case of bacteremia which apparently was treated successfully [5 6 10 11]

Sulfadiazine was given in conjunction with streptomycin, because it was felt that this was justifiable in view of extending to an extremely ill patient all forms of therapy which offered hope. It has been noted that sulfonamides probably have a place in the treatment of this disease, especially in the early stages, but are probably of little value after suppuration occurs [12] Other reports disagree state they have little or no therapeutic value Since this patient's sputum cleared rapidly, st mycin treatment by means of a nebulizer as junct to therapy was not instituted

The secondary rise in temperature after the good response to streptomycin is interpreted as due to invasion by secondary gram-positive b nonresponsive to sulfadiazine

Summary

1 A case of pneumonia due to Friedl bacillus is presented

2 The response to streptomycin was mar view of patient's age, debility, and overwhelm fection

References

1 Perlman, E , and Bullowa, J G Arch Int. M 907 (May) 1941
2 Solomon, S J A.M A 108 937 (Mar 20) 1
3 Heilman F R. Proc Staff Meet. Mayo C 33 (Feb 7) 1945
4. Herrell W E and Nichols D R. Proc Staf Mayo Clin. 20 451 (Nov 28) 1945
5 Learner N and Minnich, W R. Ann Int 25 516 (Sept.) 1946
6 Bishop C A. and Rasmussen, R. F J A M 821 (July 6) 1946
7 Harris, H. W Tartakaff, S , Grynbaum, B , Compte, P New England J Med. 236 611(Apr 2
8 National Research Council, Committee on therapeutics and Other Agents J A M A 132 4 (S 1946
9 *Idem* J A M A. 132 70 (Sept 14) 1946
10 Tartakoff, S Harris H W Murray R. Pa and Finland M New England J Med. 235 681(1 1946
11 Kobacker J L and Mehlin, G B Am J 210 66 (July) 1945
12 Hyde L and Hyde, B Am J M Sc 20 (May) 1943

NEW COMPOUNDS HELP RELIEVE ALLERGIES

New compounds, many stemming from pyridine, a component of coal tar, today seemingly have on the run those allergic symptoms that plague human beings Dr C M Suter, director of the chemical division of the Sterling-Winthrop Research Institute, Rensselaer, New York, addressing a sectional meeting of the American Chemical Society in Erie, Pennsylvania, disclosed that among hundreds of compounds studied, several potent drugs have been discovered to relieve what medicine defines as "a condition of unusual or exaggerated specific susceptibility to a substance harmless in similar amounts to the majority"

People, for instance, allergic to ragweed, or rose pollen, or even cat's fur, feathers, certain grasses, or any number of substances which others can take with ease, are due for long-sought relief, according to Dr Suter "This new group of drugs may well contribute to the comfort of more persons tha other discovery since the barbiturates were made available," Dr Suter said

Dr Suter pointed out that one of the most i tant groups of newer synthetic medicinals is fied generally as "antihistamine agent" H plained that some years ago it became eviden there was a close relation between histam stimulator of the autonomic nervous system allergies

"Several potent drugs have now been disco that counteract or interfere with the action of mine," Dr Suter continued "Chemically the all tertiary amines having two methyl grou tached to nitrogen Most of the active comp are also derivatives of 2-aminopyridine, wh turn is made from pyridine, a component o tar"

DEPARTMENT OF MEDICAL CARE INSURANCE

CONDUCTED BY GEORGE P FARRELL, *Director*

QUARTERLY report on membership in voluntary nonprofit medical care plans in New York State for the period ending March 31 1948 and statement of comparative gains in benefits earned premium income and claims for the first quarter in 1947 and 1948

TABLE 1.—MEMBERSHIP

	United Medical Service Inc New York	Western New York Medical Plan Inc. Buffalo	Medical and Surgical Care, Inc., Utica	Genesee Valley Medical Care Inc. Rochester	Northeastern New York Medical Service Inc. Albany	Central New York Medical Plan Inc. Syracuse	Totals
March 31 1948	833 122	128,779	94,883	50 952	30,017	15 926	1 153 189
December 31 1947	730,293	119 708	89,369	46,145	22 778	15,32?	1 023 615
Increase	102,829	9,071	5 014	4,817	7,239	604	129,574

TABLE 2.—COMPARISON OF INCURRED BENEFITS TO MEMBERS

	United Medical Service Inc., New York	Western New York Medical Plan, Inc., Buffalo	Medical and Surgical Care, Inc. Utica	Genesee Valley Medical Care Inc., Rochester	Northeastern New York Medical Service Inc. Albany	Central New York Medical Plan, Inc. Syracuse	Totals
1st Quarter 1948	$794,397	$151 851	$142 198	$45 762	$41 698	$32 145	$1,208,051
1st Quarter 1947	444,340	212 471	91 879	7 184	4 788	31 582	792,244
Increase	$350 057	—$ 60 620	$ 50,319	$38 578	$36,910	$ 563	$ 415,807

TABLE 3.—COMPARISON OF EARNED PREMIUM INCOME

	United Medical Service, Inc., New York	Western New York Medical Plan, Inc., Buffalo	Medical and Surgical Care Inc. Utica	Genesee Valley Medical Care, Inc. Rochester	Northeastern New York Medical Service Inc., Albany	Central New York Medical Plan, Inc. Syracuse	Totals
1st Quarter 1948	$1,386,145	$223 612	$186 714	$77 859	$56 669	$42,981	$1 974,010
1st Quarter 1947	778,286	230,200	135,133	26,879	7,394	31,884	1,209 775
Increase	$ 607,859	—$ 6,588	$ 51,582	$51 010	$49,275	$11 097	$ 764,235

TABLE 4.—COMPARISON OF NUMBER OF CLAIMS

	United Medical Service, Inc. New York	Western New York Medical Plan, Inc. Buffalo	Medical and Surgical Care Inc Utica	Genesee Valley Medical Care, Inc. Rochester	Northeastern New York Medical Service, Inc. Albany	Central New York Medical Plan Inc., Syracuse	Totals
1st Quarter 1948	16 179*	4 923	4,855	1 197	890	2 745	40 789
1st Quarter 1947	8,076*	12 999	3,969	146	70	3 450	27 710
Increase	8,103	—8,076	886	1,051	820	295	3,079

Paid basis all others on incurred basis.

With an increase of 129,574 members during the first quarter of 1948, making the total membership 1,153 189 it is reasonable to expect that membership will exceed 1,500 000 by the end of 1948

Incurred benefits to members was $1,208,051 compared to $792 244 for the same period in 1947 representing an increase of $415,807 or 52 per cent.

The plans have shown an increase of 63 per cent in earned premium income during the quarter and 11 per cent increase in claims.

NECROLOGY

Fred S Diefendorf, M D, died on May 19 at his home in Angola His age was seventy-six Dr Diefendorf was graduated from the University of Michigan Medical School in 1898 and had practiced medicine in Sharon Springs and Angola He resigned last year as health officer at Evans after serving in that position for thirty-two years Dr Diefendorf was a member of the American Medical Association and the New York State and Erie County Medical Societies

William Van Pelt Garretson, M D, of New York City, aged sixty-eight, died on June 5 Dr Garretson was graduated from the College of Physicians and Surgeons, Columbia University, in 1903 and studied at the University of Berlin in 1904 and 1905 He taught at New York Polyclinic Hospital starting as a clinical assistant and becoming professor of nervous and mental diseases He was a consulting neurologist at Harlem and Manhattan State Hospitals, New York City, Bayonne Hospital, Bayonne, New Jersey, New York State Reconstruction Home, West Haverstraw, and Lawrence Hospital, Bronxville He was also a consultant in neurology, psychiatry, and endocrinology at St Clare's Hospital, New York City Dr Garretson, a diplomate of the American Board of Psychiatry and Neurology, was a member of the New York Neurological Society, the Association for the Study of Internal Secretion, the New York Society for Clinical Psychiatry, the American Medical Association, and the New York State and County Medical Societies

John Wesley Judd, M D, Ithaca, died on June 6 at the age of seventy-eight Dr Judd was graduated from the University of Vermont College of Medicine in 1896 Retired from active practice, Dr Judd had served as consultant obstetrician at Tioga County Hospital, Waverly, and Tompkins County Memorial Hospital, Ithaca He was a diplomate of the American Board of Obstetrics and Gynecology, a fellow of the American College of Surgeons, and a member of the American Medical Association, the Central New York Association of Obstetricians and Gynecologists, and the New York State and Tompkins County Medical Societies

Frederick Leighton, M D, Niagara Fall, died on June 6 His age was sixty-three A physician in Niagara Falls for the past thirty-five years, Dr Leighton was a graduate of the University of Michigan Medical School in 1909 He served as senior surgeon on the staff of Mt St Mary's and Niagara Falls Hospitals, Niagara Falls A past president of the Niagara Falls Academy of Medicine, Dr Leighton was a member of the American Medical Association and the New York State and Niagara County Medical Societies

Charles Bates Phillips, M D, sixty-three, died at his Amsterdam home on May 11 Dr Phillips was graduated from Albany Medical College in 1908 and had practiced in Amsterdam since that time He was a surgeon on the staffs of Amsterdam City and St Mary's Hospitals, Amsterdam A past president and member of the Montgomery County Medical Society, Dr Phillips was also a member of the American Medical Association and the New York State Medical Society

F Ward Renfrew, M D, Queens, died on April 29 at the age of fifty-five Dr Renfrew was graduated from Cornell University, Medical College, in 1919 and interned at New York Hospital He served with the Army Medical Corps during the first World War Retired since 1946, Dr Renfrew had been an associate surgeon on the staffs of Downtown-Beekman and City Hospitals and was connected with the United States Public Health Service during World War II He was a member of the American Medical Association and the New York State and County Medical Societies

Samuel Stewart, M D, died at his home in Syracuse on May 15 His age was sixty-eight Dr Stewart was graduated from the College of Physicians and Surgeons, Columbia University, in 1906 and had been a practicing physician in Syracuse for forty years He served on the honorary staff of Crouse-Irving Hospital, Syracuse, and was a member of the Syracuse Academy of Medicine, the American Medical Association, and the New York State and Onondaga County Medical Societies

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NEW YORK'S BLUE CROSS PLAN ISSUES ANNUAL REPORT FOR 1947

The enrollment of 417,191 persons in Associated Hospital Service during 1947 brought the over-all total to 3,206,178, or one out of every three persons in the Greater New York area, according to the 1947 Annual Report

Because approximately 10,000 employers now pay all or part of the subscription charges for their employes, the service has been extended to increasingly large numbers of persons in the lower income groups, the report states The organization's growth also is attributed to the increasing number of unions enrolled

MEDICAL NEWS

Measles Epidemic Decreasing in New York City

THE 1948 measles epidemic which has afflicted 24 310 children in New York this year and caused eighteen deaths is running out, the City Health Department reported in June It added that the peak was passed a few weeks ago

Virtual disappearance of the disease after schools close for the summer can be predicted, health authorities said. May the first month since the start of the outbreak to show a decline, brought only 5 102 new cases and five deaths. While the current outbreak will surpass that of 1946, when there were 19,201 cases in the first five months, it will not equal the moderate epidemic of 1944 At this time four years ago there were 24,544 cases of measles reported in New York City

The 1948 incidence will not compare with the record of 79 640 cases for the full year 1941 or equal the fair-size epidemic of 1938 when there were 34 601 cases.

Confinement of the outbreak this year was credited largely to widespread use of gamma globulin a human blood preventative This year the Health Department has obtained from the Red Cross and distributed free to physicians 51 327 doses of the serum to be injected into exposed children under five years of age.

Death Rate for TB at New Low in 1947

DEATHS from tuberculosis in the United States reached a new low in 1947 with 47,636 reported, Dr James E Perkins, managing director of the National Tuberculosis Association, announced at the Association s annual meeting in June in New York City

Basing his reports on provisional figures received from state health departments Dr Perkins said the nation s tuberculosis death rate dropped to 33 2 persons in 100 000 population from a rate of 36 4 in 100 000 in 1946, when 50 911 deaths were reported

New York City's rate was 44.3 in 100 000 last completed a survey to determine the occupational therapy needs of all patients in state hospitals and schools. It was supervised by Miss Virginia Scullin, director of occupational therapy for the department and formerly in charge of that activity

The value of mass chest x ray surveys and services in discovering an estimated 250 000 unknown tuberculosis cases throughout the nation was cited by speakers at a morning session Dr F J Hill Minneapolis Health Commissioner said a city wide survey of 301 513 citizens in 1947 disclosed that 3,850 were tubercular

Similar experiences were reported from Sacramento Calif Watertown Mass. and from Florida where efforts are under way to x-ray the entire adult population The speakers emphasized that the surveys are only a screening process and must [illegible] who cannot be reached in any other way achieve a measure of adjustment through this form of therapy As practiced in the state hospitals it includes such pursuits as handicrafts and habit training.

Manual on Multiple Sclerosis Distributed to Physicians

APPROXIMATELY 76 000 physicians in the United States have recently received a manual of information on the diagnosis and treatment of multiple sclerosis prepared by the Medical Advisory Board of the National Multiple Sclerosis Society

In this 16-page manual criteria are set up for a uniform standard of diagnosing multiple sclerosis a chronic disease of the central nervous system which is now considered by many medical authorities to be the major neurologic problem of the present [illegible] the Public Health Service will undertake funds made available by the National Mental Health Act, the report says. The requests for trained personnel however especially for psychiatrists with clinic experience have not been met, primarily because clinics cannot compete financially with private practice.

Developments in research in dementia praecox and psychosomatic medicine, directed by the committee are outlined in the report. Under the supervision of Dr Nolan D C Lewis, director of the division of psychiatric research studies are being made at the Henry Phipps Psychiatric Clinic Johns Hopkins

names. No extensive survey of the actual incidence of MS in this country has ever been made, and the present need for knowledge as to prevalence will be filled to a great extent, it is believed if physicians provide this necessary exclusively numerical data. One of the aims of the Society is to determine the prevalence of the illness as well as the influence of climatic and geographic distribution.

To that end, the National Multiple Sclerosis Society with the advice and cooperation of the [illegible] progressing toward severe mental disturbances comparisons of the incidence of dementia praecox among identical and fraternal twins, and a study of the patients' home environments.

Largely through the efforts of the national committee the report declares at least fifteen state legislatures are studying the problems of mental illness Through the organization s efforts, also an Association of Psychiatric Clinics for Children has been established its aim to instigate establishment of 700 community clinics each staffed by a psychiatrist.

NECROLOGY

Fred S Diefendorf, M D, died on May 19 at his home in Angola His age was seventy-six Dr Diefendorf was graduated from the University of Michigan Medical School in 1898 and had practiced medicine in Sharon Springs and Angola He resigned last year as health officer at Evans after serving in that position for thirty-two years Dr Diefendorf was a member of the American Medical Association and the New York State and Erie County Medical Societies

William Van Pelt Garretson, M D, of New York City, aged sixty-eight, died on June 5 Dr Garretson was graduated from the College of Physicians and Surgeons, Columbia University, in 1903 and studied at the University of Berlin in 1904 and 1905 He taught at New York Polyclinic Hospital starting as a clinical assistant and becoming professor of nervous and mental diseases He was a consulting neurologist at Harlem and Manhattan State Hospitals, New York City, Bayonne Hospital, Bayonne, New Jersey, New York State Reconstruction Home, West Haverstraw, and Lawrence Hospital, Bronxville He was also a consultant in neurology, psychiatry, and endocrinology at St Clare's Hospital, New York City Dr Garretson, a diplomate of the American Board of Psychiatry and Neurology, was a member of the New York Neurological Society, the Association for the Study of Internal Secretion, the New York Society for Clinical Psychiatry, the American Medical Association, and the New York State and County Medical Societies

John Wesley Judd, M D, Ithaca, died on June 6 at the age of seventy-eight Dr Judd was graduated from the University of Vermont College of Medicine in 1896 Retired from active practice, Dr Judd had served as consultant obstetrician at Tioga County Hospital, Waverly, and Tompkins County Memorial Hospital, Ithaca He was a diplomate of the American Board of Obstetrics and Gynecology, a fellow of the American College of Surgeons, and a member of the American Medical Association, the Central New York Association of Obstetricians and Gynecologists, and the New York State and Tompkins County Medical Societies

Frederick Leighton, M D, Niagara Fall , die June 6 His age was sixty-three A physicia Niagara Falls for the past thirty-five years, Leighton was a graduate of the Universit Michigan Medical School in 1909 He serve senior surgeon on the staff of Mt St Mary's Niagara Falls Hospitals, Niagara Falls A president of the Niagara Falls Academy of Medi Dr Leighton was a member of the American Me Association and the New York State and Nia County Medical Societies

Charles Bates Phillips, M D, sixty-three, di his Amsterdam home on May 11 Dr Phillips graduated from Albany Medical College in 190 had practiced in Amsterdam since that time was a surgeon on the staffs of Amsterdam City St Mary's Hospitals, Amsterdam A past presi and member of the Montgomery County Me Society, Dr Phillips was also a member of American Medical Association and the New State Medical Society

F Ward Renfrew, M D, Queens, died on Apr at the age of fifty-five Dr Renfrew was gradu from Cornell University, Medical College, in and interned at New York Hospital He se with the Army Medical Corps during the first W War Retired since 1946, Dr Renfrew had bee associate surgeon on the staffs of Downtown-E man and City Hospitals and was connected with United States Public Health Service during W War II He was a member of the American Me Association and the New York State and Co Medical Societies

Samuel Stewart, M D, died at his home in S cuse on May 15 His age was sixty-eight Stewart was graduated from the College of Physi and Surgeons, Columbia University, in 1906 and been a practicing physician in Syracuse for f years He served on the honorary staff of Cro Irving Hospital, Syracuse, and was a member o Syracuse Academy of Medicine, the Amer Medical Association, and the New York State Onondaga County Medical Societies

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Child Safety to Be Subject for Campaign

THIS fall the Metropolitan Life Insurance Company, in cooperation with the U S Children's Bureau, the American Academy of Pediatrics, and the National Safety Council, will attempt to focus more attention on the problem of reducing accidents in the preschool age group

Because of the remarkable improvement in communicable disease mortality, accidents now constitute the leading cause of death in child one to fifteen years of age

A special packet of material on child s cluding recent statistical studies and a trated booklet for the public, will be avai Physicians who wish to have copies of t for distribution to their patients will them by the Company's field representat

Seven Hundred Surgeons of 32 Nations Meet in Rome

SEVEN hundred delegates from thirty two nations attended the sixth congress of the International College of Surgeons in Rome, Italy, in May

American Ambassador James C Dunn opened a United States Navy exhibit, "A Panorama of Military Surgery in the Second World War Guido Gonella, Italian Minister of Education, and Salvatore Rebecchini Mayor of Rome, addressed the first session.

A report on the development of a serum from human tissue that destroys or retards cancerous growth in mice was presented on the opening day of the surgeons congress by Dr Maxwell Maltz, New York City

In developing the serum Dr Maltz found two undetermined factors in the human cell, a growth factor and an antigrowth factor according to his report. He said he has identified a factor in the human cell that stops the growth of skin or other tissue when a wound is healed otherwise the cells would continue to multiply at an abnormal rate as in cancer He also identified the growth factor which makes cells multiply until a wound is closed he said

In his experiments with mice, Dr Maltz found that he could make wounds heal rapidly or slowly, depending upon the concentration of serums used containing growth and antigrowth factors.

In one serum, he used scrapings from what is known as granulation tissue. This is the rapidly growing tissue that builds up soon after a wound occurs. It prepares the way for the rebuilding of skin cells that eventually close a wound

Dr Maltz combined this serum with serum from the tissue of the spleen which, in the human body is believed to be immune to all types of cancer Other scientists have reported that it apparently contains an antigrowth factor

The combined serum was found by Dr Maltz to be effective against two types of cancer in mice

State to Increase Occupational Therapy in Mental Hospitals

DR. FREDERICK MacCURDY State Commissioner of Mental Hygiene, has announced that extension of occupational therapy to all patients who can benefit by it in the 26 mental hygiene hospitals and schools will be made possible through 209 new positions

Dr MacCurdy said this department recently completed a survey to determine the occupational therapy needs of all patients in state hospitals and schools. It was supervised by Miss Virginia Scullin, director of occupational therapy for the department and formerly in charge of that activity at Pilgrim State Hospital The survey indicated that total treatment would be improved if occupational therapy could include more patients. With additional personnel available, the treatment can be provided for several thousand more mental patients.

Dr MacCurdy said that frequently patients who cannot be reached in any other way achieve a measure of adjustment through this form of therapy As practiced in the state hospitals it includes such pursuits as handicrafts and habit training

Manual on Multiple Sclerosis Distributed to Physicians

APPROXIMATELY 76 000 physicians in the United States have recently received a manual of information on the diagnosis and treatment of multiple sclerosis prepared by the Medical Advisory Board of the National Multiple Sclerosis Society

In this 16-page manual criteria are set up for a uniform standard of diagnosing multiple sclerosis, a chronic disease of the central nervous system which is now considered by many medical authorities to be the major neurologic problem of the present day The manual also gives the newest information on rehabilitation and symptomatic treatment, as well as on treatments founded upon current theories of the disease This manual was published in full in the November 1, 1947 issue of the *Journal of the American Medical Association*.

In an effort to obtain information on the prevalence of the disease, the National Multiple Sclerosis Society is enclosing with the manual a letter to physicians asking that they inform the Society of the number of patients in their care who are multiple sclerosis sufferers without revealing their names. No extensive survey of the actual incidence of MS in this country has ever been made and the present need for knowledge as to prevalence will be filled to a great extent, it is believed, if physicians provide this necessary exclusively numerical data. One of the aims of the Society is to determine the prevalence of the illness as well as the influence of climatic and geographic distribution

To that end, the National Multiple Sclerosis Society, with the advice and cooperation of the United States Public Health Service will undertake a national survey on the prevalence of multiple sclerosis in the United States. The information now sought from physicians on the number of MS patients in their care will be valuable as an initial fact-finding effort.

It will assist the Society s statistical committee under its chairman Dr Lawrence C Kolb of the U.S. Public Health Service, in formulating its program to secure more comprehensive information through local area surveys of multiple sclerosis.

Prize Awards Announced for Scientific Exhibits at Annual Meeting

FIRST and second prize awards and honorable mentions have been announced for the scientific exhibits which were shown at the 142nd Annual Meeting of the Medical Society of the State of New York, from May 17 to 21, at the Hotel Pennsylvania, New York City

For scientific research, the first prize award was presented to Dr Gilbert Dalldorf, of the Division of Laboratories and Research, New York State Department of Health, Albany, for his exhibit, "Vaccination Against Tuberculosis with BCG Vaccine"

The second prize award was given to Dr Lee A Hadley, Syracuse, for an exhibit, "Intervertebral Foramen Studies" Honorable mention went to Drs B S Oppenheimer, A P Stout, and E T Oppenheimer, of the department of cancer research, Columbia University, College of Physicians and Surgeons, for an exhibit, "Sarcomas Induced in Rats by Implanting Cellophane"

For clinical research, Dr William Benham Snow, Columbia-Presbyterian Medical Center, received the first prize award for his exhibit, "A Program in Physical Medicine"

The second prize award was presented to Drs David Graubard, Milton H Waldman, and Raphael W Robertazzi, of the Post-Graduate Medical School and Hospital, New York City, for their exhibit, "Intravenous Procaine"

Dr Harry Wallerstein and Dr Alfred Schwartz, of Jewish Memorial, Morrisania City, and Queens General Hospitals, received honorable mention for their exhibit, "Management of Erythroblastosis Fetalis"

Space Needed for Tuberculosis Care

PROSPECTS for early addition of the large number of hospital beds needed for tuberculosis patients in the United States are poor, Dr Myron D Miller, medical officer in charge of the United States Marine Hospital, Neponsit Point, Queens, reported June 16 at the annual meeting of the National Tuberculosis Association at the Hotel Pennsylvania, New York City

Dr Miller said that only a few states meet or exceed the minimum ratio of two and a half beds for each annual tuberculosis death established in the Federal hospital survey and construction act "Hospital beds for tuberculosis patients," he said, "have not increased since the onset of war despite increased needs"

Dr Robert E Plunkett, assistant commissioner for tuberculosis in the New York State Health Department, declared that, while the state's over-all ratio is 3 2 beds for each annual death, the situation is unsatisfactory because of bed shortages in the New York City, Albany, and Buffalo areas

Encouraging results in attacking the disease in guinea pigs by administering two antitubercular drugs, streptomycin and PAS, or para-aminosalicylic-acid, were reported by Dr Robert G Bloch, of the department of medicine of the University of Chicago PAS has been found effective when used alone with human patients, and Dr Bloch expressed hope that combining it with streptomycin can bring added relief

United Medical Service Elects Officers

DR CHARLES GORDON HEYD, past-president of the American Medical Association, was elected chairman of the board of directors and president of United Medical Service at the association's annual meeting held at headquarters, 80 Lexington Avenue, New York City, it was announced recently

Dr Maximin De Mouy Touart of the Department of Laboratories and Research of Westchester County, was elected a vice-president and appointed a member of the executive committee

Dr William Brant Rawls, president-elect of the Medical Society of the County of New York, was elected a member of the board of directors Other newly elected directors are H Edward Bilkey, a trustee of Lenox Hill Hospital, New York City, and Dr John B D'Albora, Brooklyn, president of the Second District Branch of the New York State Medical Society

United Medical Service is sponsored by the Medical Society of the State of New York and 17 county medical societies

Department Sponsors In-Service Course in Public Health Nutrition

AN IN-SERVICE course in public health nutrition, sponsored by the State Department of Health and Syracuse University will be held on the university campus July 5 to 17 This institute is designed to meet the needs of health workers in the community physicians, nutritionists, public health nurses, case workers, home economics teachers, and health educators

Technics in Community Nutrition is the theme of the first week, July 5–10 The Place of Nutrition in the Public Health Program will be discussed on July 6 at a round table led by Dr Herman E Hilleboe, commissioner of health, followed by a discussion of joint planning by agencies in community nutrition programs On July 7, Dr William Darby, department of medicine, Vanderbilt University, and Dr H R Sandstead, chief of Nutrition Section of the United States Public Health Service, will discuss the present methods for determining nutritional status

How to Get the Public to Use Nutrition Information is the subject for another day's discussion. The problems and methods of group dynamics will be presented, and Dr. G. W. Larimore, director, Office of Public Health Education, New York State Health Department, will discuss the use of mass media in nutrition education. Dr. Charlotte Babcock, psychiatrist, University of Chicago will complete the first week's program with a discussion of the Psychological Factors Affecting Nutrition and Problems of Interviewing.

Selected Nutrition Problems will be presented in the second week, July 12–17. In the field of maternal and child health, Dr. Josef Warkany, department of pediatrics, University of Cincinnati, will discuss Nutrition in Pregnancy, and Dr. C. A. Smith, department of pediatrics, Harvard University, Nutrition in Infancy and Childhood. Nutrition of the Premature will be presented by Dr. F. R. Schlesinger, director, Bureau of Maternal and Child Health, New York State Department of Health, and Feeding the Infant and Child in the Home by Miss Eleanor Gochenour, consultant nurse in child health, New York State Department of Health.

The Public Health approach to Problems of Postponable Diseases will be presented by Dr. I. J. Brightman, assistant director, Division of Medical Services, New York State Department of Health, followed by a discussion of the Nutritional Genesis of Arteriosclerosis by Dr. W. C. Hueper, president, American Society for the Study of Arteriosclerosis, of New York, and the Nutritional Genesis of Liver Disorders by Dr. R. H. Lyons, professor of internal medicine, Syracuse University. Nutrition in Relation to Susceptibility to Disease will be discussed by Dr. P. A. Bunn, associate professor of internal medicine, Syracuse University, and Dr. R. L. Jackson, associate professor of pediatrics, University of Iowa, will present his work on Nutrition in the Management of Rheumatic Fever.

Nutrition in Dental Caries will be presented by Dr. David B. Ast, chief of the Dental Health Section, State Department of Health. The Future of Nutrition Research by Dr. L. A. Maynard, director of the School of Nutrition, Cornell University, and Nutrition in Work Performance by Dr. R. M. Bark, Army Medical Laboratory.

Opportunity for group participation and the presentation of actual problems for discussion will be provided for members of the institute. Additional information may be obtained by writing to the Department of Foods and Nutrition, College of Home Economics, Syracuse University, Syracuse 10, New York.

MEETINGS

PAST

Rochester Academy of Medicine

Dr. Paul W. Beaven was installed as president of the Rochester Academy of Medicine, succeeding Dr. Clarence P. Thomas, at the annual meeting held May 4 in Rochester.

Principal speaker at the meeting was Dr. Joe V. Meigs, clinical professor of gynecology at Harvard Medical School and chief gynecologist at Massachusetts General Hospital, Boston, who spoke on "Surgical Treatment of Cancer of the Cervix."

Health Council of Greater New York

Dr. I. Ogden Woodruff was re-elected president of the Health Council of Greater New York at the annual luncheon of the group held May 19 in New York City.

Dr. E. H. L. Corwin, in a paper read for him by Dr. Thomas D. Dublin, vice-president of the council, reported on the preliminary survey of the city's health needs which showed that careful scientific analysis could reduce further infant mortality.

Dr. Harry S. Mustard, New York City commissioner of health, also spoke, stressing the importance of free, voluntary health agencies. He praised the council's neighborhood organization and citizens' district health committees.

New York Psychoanalytic Society

Dr. Emanuel Klein spoke on "Psychoanalytic Aspects of School Problems" at the 307th meeting of the New York Psychoanalytic Society held May 25 in New York City. An executive session with Dr. Henry A. Bunker presiding was held.

Morgagni Society of Brooklyn

Three scientific papers were presented at the meeting of the Morgagni Society of Brooklyn held May 26 at the Kings County Medical Society Building.

The program included "Tests of Practical Value in the Diagnosis of Hepatobiliary Disease," Dr. I. Snapper, director of medical education, Mount Sinai Hospital. "Observations of Ulcerative Colitis," Dr. Albert F. R. Andresen, professor of clinical medicine, Long Island College of Medicine, and "Recent Developments in the Medical and Surgical Management of Peptic Ulcer," Dr. Everett D. Kiefer, Lahey Clinic, Boston, Massachusetts.

New York Council of Surgeons

Dr. Adolph Foti spoke on "Factors in the Mechanism of Angina Pectoris" at the meeting of the New York Council of Surgeons held June 8 at the Parkchester General Hospital, the Bronx.

FUTURE

American Association of Blood Banks

The annual meeting of the American Association of Blood Banks will be held in Buffalo, New York, August 26, 27 and 28, immediately following the meeting of the International Hematology Society there.

Organized in November 1947 at Dallas, Texas, the Association has for its purposes: to promote and foster the exchange of ideas and materials and the dissemination of information relating to blood banking; to foster and plan for cooperation in times

of disaster, to function as a clearing house, and to promote and foster and aid and encourage the extension of similar services throughout the United States and its territories

Membership is of two classes—institutional and individual Information may be obtained from Miss Marjorie Saunders, secretary, 3301 Junius Street, Dallas, Texas

American Congress of Physical Medicine

The American Congress of Physical Medicine will hold its annual scientific and clinical session from September 7 to 11 at the Hotel Statler, Washington, D C

All physical medicine sessions will be open to members of the medical profession in good standing with the American Medical Association Full information may be obtained by writing to the American Congress of Physical Medicine, 30 North Michigan Avenue, Chicago 2, Illinois

American College of Surgeons

The thirty-fourth Clinical Congress of the American College of Surgeons will be held at the Biltmore Hotel, Los Angeles, California, from October 18 to 22, 1948 The program of scientific sessions will include subjects in the fields of general surgery, eye, ear, nose, and throat surgery, gynecology and obstetrics, urology, and orthopedic, thoracic, plastic, and neurologic surgery

Supplementing this program will be operative clinics in hospitals in Los Angeles by showings of operations by television and motion pictures, and by a four-day hospital standardization conference for hospital personnel There will also be extensive technical and scientific exhibits

PERSONALITIES

Retired

Dr Linn C Beebe, health officer for the Village of Hamilton, after serving in the post since 1926 Dr Russell E Blaisdell, as superintendent of the Rockland State Hospital Dr J R Schermerhorn, as director of the Schenectady County venereal disease clinic, a position he has held since the program started in 1935

Honored

Dr Earl H King, Saratoga, by the Saratoga Springs Medical Society, in honor of his fifty years in the practice of medicine, at a dinner on April 29 Dr Joseph M Purcell, recently cited by the Medical Society of the State of New York for fifty years in practice, an honorary life membership from the Foresters of America, conferred for his services to the order in Mechanicville

Awarded

Dr Alan Weyl Bernheimer, New York University College of Medicine, a medal and a $1,000 honorarium for an outstanding contribution in the field of bacteriology, the annual Eli Lilly Award presented by the Society of American Bacteriologists May 12 in Minneapolis

Dr Goodwin M Breinin and Dr Walter J Maher, New York City, winners of the third annual New York City Lions Club scholarships for graduate training in ophthalmology Dr John F Erdmann, New York City, the honorary degree of Doctor of Science at New York University's 116th commencement exercises on June 9

Lieutenant Colonel Paul S Roland, formerly of New York City, who was taken prisoner in Bataan in 1942 while stationed at the Second General Hospital there as surgeon, a certificate of award from the National Government, Republic of China, the Special Breast Order of Cloud and Banner with Certificate, signed by Chiang Chung-Cheng, president

Dr Isidor Rubin, at the annual meeting of the American Gynecological Society, May 25, at Williamsburg, Virginia, a check for $1,000 for an outstanding contribution in obstetrics and gynecology produced during 1947, in recognition of his book, "Uterotubal Insufflation" Dr George Gray Ward, New York City, the Alumni Medallion for Distinguished Service to American Medicine, at the ninetieth commencement exercises of the Long Island College of Medicine, held June 10 in Brooklyn

Appointed

Dr Charles E Dutchess, Schenley Laboratories, New York City, Dr J B Rice, Winthrop-Stearns, New York City, Dr Stanton M Hardy, Lederle Laboratories, Pearl River, and Dr D K Kitchen, Bristol Laboratories, Syracuse, as members of the board of the medical section of the American Pharmaceutical Manufacturers' Association

Dr Jefferson Browder, as director of the department of surgery of the Long Island College Hospital, effective July 1 Dr Duncan W Clark, as new dean of the Long Island College of Medicine, succeeding Dr Jean A Curran, now president of the College Dr Hans Kraus, as assistant professor of clinical rehabilitation, New York University College of Medicine Dr Robert B MacLeod, as professor and chairman of the department of psychology, Cornell University

Elected

Dr Henry W Ferris, director of the Tompkins County Laboratories at Ithaca, as president of the New York State Association of Public Health Laboratories, succeeding Dr Theodore J Curphey

Dr James L McCartney, president of the new Nassau Neuropsychiatric Society, to be aided by Dr C Milton Meeks as vice-president, and Dr Peter G Denker as secretary-treasurer Dr Frederick N Marty, Syracuse University, to the executive council of the American Student Health Association

Speakers

Dr Anthony Bassler, New York City, on "The Etiology and Treatment of Ulcerative Colitis" at the annual convention of the Rhode Island Medical Society on May 13 Dr Henry Fineberg, superintendent of Queens General Hospital, at the meeting of the Queens Council for Social Welfare

Dr Foster Kennedy, director of the neurological service of Bellevue Hospital, on "Education Throughout Life," at the annual meeting, June 24, of the New York Welfare Council's Conference Group on Welfare of the Aged Dr V A. Van

Volkenburgh, assistant commissioner for local health administration, New York State Department of Health on "Interpreting Public Health Service to the Public" at the Massachusetts Public Health Conference and New England Health Institute at Amherst June 18.

New Offices

Dr P James English formerly of Cohocton general practice in Naples Dr William L Gates, former captain Army Medical Corps general practice in Cazenovia Dr Ward S. Jenkins, formerly on staff of the Glens Falls Hospital, general practice in Salem Dr Robert R. Kennedy Brooklyn general practice in Sag Harbor Dr L. H Kertzner formerly on staff of Morristown General Hospital Morristown New Jersey, as a member of the Hampton Clinic, Hampton Bays

Dr Curtis Lacy Freehold recently chief of the department of dermatology and allergy, U S Veterans Hospital, Vancouver, Washington general practice in Catskill Dr Nicholas T Lombardi reopened his office for general practice in Amsterdam Dr M Edward Miller formerly of Roscoe general practice in Jeffersonville Dr William K Major, recently discharged from the Army after serving at a base hospital in Oregon and on a troop transport general practice in Waterloo

Dr Carl P Sherwin Scarsdale formerly resident physician at Bellevue Hospital New York City general practice in Malone Dr John R. Roberts, former captain in Army Medical Corps at Fort Benning Station Hospital, general practice in Kingston

FELLOWSHIPS ON PATHOLOGY OF TUMORS

Through the W T Grant Foundation, fellowships on the pathology of tumors are available in the laboratories of Memorial Hospital for the Treatment of Cancer and Allied Diseases, New York City Requirements are that a candidate shall hold appointment as assistant professor or instructor in a university department of pathology and that he shall be given a one-year leave of absence with a guarantee that he may return to academic status after completion of the fellowship These fellowships are designed for training of personnel of universities which have received government grants for establishment of correlated work in the teaching of cancerology Students will have access to about 18,000 specimens per year and will attend conferences and follow-up clinics Research may be undertaken as a minor portion of the program, provided it forms a part of one of the research programs being conducted in the institution The annual stipend of $5,000 may be supplemented by the university in any individuals case.

Application should be made to Dr Fred W Stewart Memorial Hospital 444 East Sixty Eighth Street New York City 21

NUMBERED BABIES DUE NEXT YEAR

Newborn American babies will be assigned serial numbers in a national system getting under way the first of next year, the Public Health Service announces All U.S numbers will start with 1 all Canadian numbers with 2. Following that numeral will be two indicating the state—*e g*, 01 for Alabama 48 for Wyoming. These are followed by a dash and by two numbers to indicate the year Finally in a six digit set, comes the baby's number Thus, the first 1949 infant in Alabama will be assigned 101-49-000001 Wyoming's will get 148-49-000001 —*Medical Economics June 1948*

THIRD WORLD CONGRESS ON MENTAL HEALTH

The Third World Congress on Mental Health will be held in London from August 11 to 21 1948 It is expected to attract some 3,000 people from over 50 countries. The difficulties of reaching this country may be eased by the active support promised by UNESCO and WHO The congress will embody international conferences on child psychiatry and medical psychotherapy (Aug. 12–18) and on mental hygiene (Aug 16–21) The themes will be in the first conference, foundations of mental health in childhood in the second guilt and in the third mental health and world citizenship The congress committee headed by Dr J R. Rees, is exerting itself to ensure that the communications on this last topic shall represent all shades of opinion in each country Sociologists psychologists, educationists and others are being invited to participate and already discussion groups or preparatory commissions have been set up in this country and in North America to synthesize different individual views

The work of these commissions is coordinated from London by means of a monthly digest of activity in all countries The organizers hope is that international comparison will lead to a clearer understanding of the social relationships bearing on the well-being of the individual and of society Information may be had from the congress office at 39, Queen Anne Street London, W 1

HOSPITAL NEWS

Hospital Departments of "Home Care" to Be Started by Fall

HOSPITAL Commissioner Edward M Bernecker announced in May that he hopes to have the "departments of home care" planned for fourteen municipal hospitals in operation by this fall

An advisory committee will be appointed shortly, Dr Bernecker said, to expedite the Hospital Department's plans to install home care services with $1,368,750 of the $4,000,000 in extra funds to be made available to the department July 1 by the recently announced increase in municipal transit fares The development of home care services is intended to cut down the present overcrowding of hospitals

Dr Bernecker said that the advisory committee will include representatives of the Academy of Medicine, the County Medical Societies of New York City's five counties, visiting nurses services, the Hospital Council of Greater New York, the Health and Welfare Departments, and individuals who have pioneered in home care

Hospital Practice by Groups Urged at Institute

GROUP practice centered in hospitals offers the best of modern medicine to the American public, Dr Dean A. Clark, medical director of the Health Insurance Plan of Greater New York, told 100 hospital administrators at the opening, on June 14, of a two-week institute at Columbia University's School of Public Health, New York City

Chief obstacles to its attainment are psychologic, professional, and economic, Dr Clark contended, and three major problems are involved First, he said, was a "break" with the voluntary hospital tradition that limits services for ambulant patients to persons of low income Second, "unfair" competition in medical practice will be offered by the group if the hospital subsidizes its establishment or operations Third, payment must be received for the medical group's services to ambulant and "at home" patients

Dr E H L Corwin, executive secretary of the New York Academy of Medicine's committee on public health relations, urged cooperative efforts to preserve voluntary hospitals

He held that 30 per cent of operating cost deficits should be made up by the community and that the hospital's share from tax funds should be increased Seventy per cent of a hospital's operating expense is covered by patients' fees, he noted, and a community can help also by participating in prepayment plans Meanwhile, he cautioned, hospitals must reduce waste and costs

Other speakers included Dr Claude W Munger, director of St Luke's Hospital, Dr Edgar C Hayhow, president of the American College of Hospital Administrators, and Dr Morris Hinenburg, executive director of the Jewish Hospital, Brooklyn

The institute is sponsored by the American College in cooperation with the Columbia Faculty of Medicine, the State Hospital Association, and the Greater New York Hospital Association Among the problems to be considered by the institute are State, city, and rural programs for hospital expansion, rehabilitation as a function of the general hospital, clinical programs in the treatment of poliomyelitis, and cancer research centers

Rochester's Hospitals Operate Close to Capacity

HEAVY admittances continue to keep Rochester's six voluntary hospitals running at a near-capacity rate with little indication of a letup, according to a recent report from hospital directors

They reported in May that figures for April kept pace with March statistics and in some instances exceeded them, with maternity admittances generally heavy and with medical, surgical, and pediatric departments running full Emergencies were also being handled at a near-capacity rate

While in March many elective admissions for surgery or observation were either canceled or postponed due to the lack of available beds, this situation apparently eased somewhat in April However, the traditional season for tonsil removal has now arrived and at least one hospital reported reservations for tonsil operations have been made as far ahead as July

Here is the current situation, by hospitals

Highland—Admissions have dropped off slightly from March, with extra beds in use then no longer needed Departments are still running at capacity *General*— Maternity admissions were up in April, medical and surgical departments were running 100 per cent of capacity General over-all admittances were 96½ per cent of capacity, against 91 per cent in March

Genesee—Running about 90 per cent of capacity, with maternity admittances fairly light, emergencies heavy, pediatrics at capacity *Strong*—Running 100 per cent of capacity in all departments *St Mary's*—Recorded 1,330 admissions in April for 11,011 days of hospital care Admissions averaged 44⅓ daily, higher than in March. Occupancy was more than 100 per cent of capacity

Park Avenue—April admissions ran 101 per cent of capacity as against 88 per cent in March Maternity ran 104 per cent

New Referral Form Created for Hospital, Physicians, and Public Health Agencies

A MEANS for more effective referrals between hospitals private physicians, and public health nursing agencies has been announced by the United Hospital Fund of New York in the revision of the Greater New York inter-agency referral form. This method of referral has created nation wide interest as evidenced by inquiries from medical and nursing agencies in fifteen states since January 1

The new method and form, which began several years ago in a project undertaken jointly by the Medical Social Work Committee of the Brooklyn Council for Social Planning the staff of the Visiting Nurse Association and a United Hospital Fund Social Service Consultant, is thought to be the only community wide, uniform referral system now in use in the country's health and welfare agencies. This referral system is used by the majority of the large voluntary hospitals and has recently been adopted by Commissioner Edward M Bernecker for municipal hospitals. It is being used increasingly by private physicians for their office patients to insure proper follow up care in the home.

Public health nursing agencies in Greater New York which are cooperating in use of the form are The Association for the Aid of Crippled Children, New York City Department of Health Bureau of Nursing Visiting Nurse Associations of Brooklyn and Staten Island Visiting Nurse Service of New York, and the Community Service Society Nursing Department.

The form is designed to promote constructive use of auxiliary services for the patient s social as well as physical rehabilitation A continuation sheet provides means for continuing interchange of information between agencies The form takes into consideration all possible services by various medical professions for the patient the physician hospital nurse, physical therapist occupational therapist dietitian medical social worker, public health nurse and others concerned with planning the patient s continuing care The Executive Committee, formed from representatives of the professions in Public Health Nursing Agencies and hospitals believes the form will be a means for projecting hospital thinking to problems which may arise from home care.

Bellevue Opens a ' Pilot Plant for Rehabilitation Work in U.S

THE New York University Bellevue Medical Center's Institute of Rehabilitation and Physical Medicine was formally opened June 17 at its interim quarters in New York City

Described as a pilot plant for other rehabilitation activities in the United States, the institute for the first time integrates training of physicians and technicians in rehabilitation research in the field, and treatment and training of handicapped persons. The four-story building, once a public bath and later a City Welfare Department station will house the institute until completion of the medical center in 1950

Bernard M Baruch, a speaker at the opening, said ' I know of nothing more intriguing or worthwhile than this institute. It holds our hope that those who enter here will be enriched in body, soul and spirit.' Other speakers were Dr Harry Wood burn Chase chancellor of N Y U and General William J Donovan, wartime director of the Office of Strategic Services. Dr Howard A. Rusk, director of the institute presided

Neurological Institute Presents Program on Chemotherapeutic Treatment of Poliomyelitis

THE Neurological Institute of New York is planning a program of treatment of poliomyelitis by chemotherapy, according to an announcement by Dr Edwin G Zabriski, acting director

The institute is desirous of obtaining very early cases. If such cases are noted by physicians, immediate notification by telephone may be made so that the patients may be transferred if directed to the Neurological Institute at once Telephone Wadsworth 3-2500, Extension 7636.

There is a limited supply of funds to be applied to patients unable to afford routine ward expenses.

Institutes on Diarrhea of the Newborn

IN ORDER to help hospitals plan their program for the control of diarrheal diseases in newborn infants, one-day institutes are being held by the State Medical Society and the State Department of Health in each of the eleven State Medical Society regions (exclusive of New York City) Representatives from each of the 272 upstate hospitals maternity homes, and child care institutions have been invited to participate in these meetings.

The program for each institute includes a discussion of diagnosis and treatment, the epidemiologic basis for the new Regulation 35 (precautions to be observed for the control of diarrhea of the newborn) simplification of nursery technics, and hospital administration in relation to the control of diarrhea of the newborn

Following the formal program a question-answer period allows hospitals to present their problems for discussion, and suggestions as to their solution are discussed by the participants.

Nursing Schools of Greater New York Listed by Hospital Association

THE Greater New York Hospital Association, representing 98 voluntary nonprofit hospitals and 22 municipal hospitals, in collaboration with Associated Hospital Service—New York's Blue Cross Plan—has published a complete list of the 36 registered and 9 practical nursing schools in the metropolitan area, Miss Helen Hayes, chairman of the Citizens' Committee on Hospital Careers, announced in June

Young men and women interested in the nursing profession and other hospital careers may obtain a copy by writing or phoning to the Greater New York Hospital Association, 72 Wall Street, New York City 5, DIgby 4-5570, or at their local hospital

NEWS NOTES

The third in a series of lectures for the Institute of Metabolism and Nutrition was given at the Doctors' Hospital of Queens, Jamaica, Long Island, by Dr Charles L Fox, Jr, on June 17 Dr Fox, professor of bacteriology at the College of Physicians and Surgeons, Columbia University, spoke on "Electrolyte Therapy in Medicine and Surgery"

Broadacres Sanatorium, Utica, has been transferred from Oneida County to New York State, Dr Herman E Hilleboe, State Commissioner of Health, announced in June Used primarily for the treatment of tuberculosis, the sanatorium will be expanded under State operation, Dr Hilleboe said, particularly in the field of clinic services in the county The hospital has 182 beds and a staff of 100 Dr William C Jensen is expected to continue as superintendent

In 1947 a total of 8,477 women and babies received 79,148 days' care at the Woman's Hospital, New York City, according to the annual report of F Huntington Babcock, president of the hospital Fifty per cent of this number constituted ward service

At the meeting of the staff of Highland Hospital, Beacon, on May 3, Dr Ralph Hall, Cold Spring, spoke on "The Hospital and the Community" His speech was illustrated by two films, "As Others See Us" and "You're the Doctor"

There were 146 patients cared for at St Andrews Convalescent Hospital, New York City, in 1947, according to the sixtieth annual report of the hospital The number of hospital days was 4,454, with 1,826 being free hospital days

The twenty-third annual convention of the Hospital Association of New York State was held on May 26, 27, and 28, at the Olympic Arena, Lake Placid Executive secretary of the association is Carl P Wright of the Syracuse General Hospital Other officers are Dr Morris Hinenburg, Brooklyn Jewish Hospital, president, Lawrence E Kresge, Auburn City Hospital, president-elect, and Moir P Tanner, Buffalo Children's Hospital, treasurer

A dinner meeting of the Vassar Brothers Hospital Association, Poughkeepsie, was held on May 12, with association directors, hospital trustees, department heads, members of the executive committee of the Woman's Auxiliary, and presidents of the men's service clubs in the city, attending Brief talks were given by Robert Hoe, president of the board of trustees, Mrs Henry Muller, president of the Woman's Auxiliary, Dr Emil A Stoller, vice-president of the medical staff, and Ellison H Capers, administrator

A movie, "Managing Wounds of Violence," was shown at the monthly meeting of the medical staff of Mercy General Hospital, Tupper Lake, on April 30

Tumor detection clinics will be operated at the Cornwall Hospital, Cornwall, every Wednesday at 7 P M, and in the Horton Memorial Hospital, Middletown, every Monday evening at 7 P M, according to an announcement by Dr H F Pohlmann, Middletown Both clinics have been approved by the Medical Society of Orange County These clinics are for persons without symptoms who will be given complete physical examinations, including chest x-rays and essential laboratory work

At the regular meeting of the staff of St Francis Hospital, Poughkeepsie, on May 3, Dr F A Gagan presented six cases of intestinal obstruction, three of which were due to carcinoma, two were on the basis of strangulation at hernial orifices, and one a mesenteric thrombosis Deaths of the month were discussed and autopsies presented

The Veterans Administration announced in June that all ten of its hospitals in New York State had been approved by the American Medical Association and the American Hospital Association Nine have been approved, one has applied for approval by the American College of Surgeons, and seven have been approved for the training of resident physicians in medical specialties

Dr Norman R. Treves associate attending surgeon of Memorial Hospital, spoke on clinical aspects of cancer at a meeting for installation of officers of the Dora Paul Fund for Cancer Research at the hospital New York City, on June 16 The meeting also marked the second anniversary of association of the Dora Paul Fund with Memorial Hospital

St. Francis Hospital Port Jervis, admitted 2,206 persons for treatment during 1947 Included were 359 maternity cases 806 operations and 232 blood transfusions.

Dr Joseph H Globus assistant clinical professor College of Physicians and Surgeons, Columbia University and consulting neurologist and neuropathologist of Mount Sinai Hospital New York City, was guest speaker at the Dutchess County Psychiatric Society meeting, held in April at Harlem Valley State Hospital, Wingdale His subject was "Cerebrovascular Accidents'

Brooklyn s hospital problems were reviewed at a forum meeting in May, attended by lay and professional community leaders Leading the forum sessions were Dr Edward F Falsey associate professor of clinical psychiatry at the Long Island College of Medicine and chief of the William Alanson White Clinic who spoke on the Role of Psychiatric Education in the Treatment and Rehabilitation of the Medically Ill Patient Dr Paul Eger of the department of home care at Montefiore Hospital, who spoke on Montefiore Hospital Home Care Program and Dr Donald A Covalt associate professor of rehabilitation at New York University College of Medicine who discussed the 'Third Phase of Medicine.'

The bed capacity at Lawrence Hospital, Bronxville, will be increased from its present total of 104 to 162 by late 1949, if present plans are carried out on schedule The increase will be made possible by the addition of, a six-story adjunct to the present plant which will be called the Community Memorial Building of Lawrence Hospital

A three-story connecting corridor between the present Administration Building and the new building will reconcile floor levels and will make possible better elevator service for patients and visitors. Included in the new building will be three large operating rooms and a room for minor operations, a cystoscopic room, two new delivery rooms, two nurseries a doctors lounge a large central supply room a staff dining room a combined chapel library and conference room and an autopsy room

Special ceremonies and 'open house programs in observance of National Hospital Day were held in May by Staten Island s three voluntary hospitals Hospital employes staffs and members of volunteer hospital groups joined in staging the events Two of the institutions St Vincent s and Richmond Memorial held tree-planting ceremonies at which trees were dedicated to former hospital benefactors 'Open house was held at St Vincent s and Staten Island hospitals

Last year 5,887 were admitted to the Children s Hospital Buffalo for medical care The outpatient department treating children who are not confined to the hospital but come to the hospital for medical care recorded 40 222 visits by children whose families could not afford medical treatment Every child has access to the many outstanding clinics at Childrens Hospital designed and staffed especially for children These include child guidance cerebral palsy electroencephalography for the diagnosis of brain injuries, brain diseases and epilepsy radiology urology skin heart eye ear bone, neurology and dental clinics Other special services include x ray, occupational therapy, rehabilitation physical therapy, bacteriology pathology and research

The next clinico-x ray conference at St Agnes Hospital, White Plains, will be held on October 7 These conferences are open to the profession and have as their objective the discussion of interesting cases some brought in from outside others originating in the hospital Conferences are held on alternate Thursdays from 4·00 to 5·00 P M throughout *the academic year*

The Cortland County Hospital and the Nurses Home Cortland were visited by approximately 1 000 people in observance of National Hospital Day Of especial interest to the majority of the visitors was the new formula room with its equipment for terminal sterilization for all infant formulas and the kitchen

A new pathology laboratory was opened at the Caledonian Hospital Brooklyn, in May It has all modern equipment for the rapid diagnosis of cancer Dr Edmund Marino pathologist of the hospital is director of the laboratory

A newly enlarged and renovated Moses Ludington Hospital Ticonderoga was opened to the public in May The hospital now has 80 beds and all ultramodern facilities

Dobbs Ferry Hospital reports that the number of patients treated daily in the hospital in 1947 was 35 which was a daily increase of two over the previous year The total of major and minor operations was 443, an increase of 25 over 1946, and the number of babies born in 1947 was exactly 200 an increase of 27 over 1946 A total of 212 ambulance calls were answered.

An Institute for the study of medical subjects was held under the auspices of the New York State Medical Society and New York State Health Depart

ment recently at Saranac Lake Representatives from hospitals in three counties, St Lawrence, Jefferson, and Franklin, were present

The two sessions were under the chairmanship of Dr Sidney Mitchell, north regional chairman for pediatrics Speakers for the morning session included Dr Samuel L Pettit, assistant pediatrician at Physicians' Hospital and Champlain Valley Hospital, Plattsburgh, and Dr Ray E Russell, epidemiologist, Bureau of Communicable Disease Control, New York State Department of Health

Buffalo General Hospital has received a grant of $1,881 04 from the New York State Division of the American Cancer Society for the establishment of a cytologic diagnostic laboratory service The grant will be used to purchase necessary equipment and to pay a technician's salary for six months The laboratory will be under the direction of Dr Clyde L Randall and Dr Kornel L Terplan, assisted by Dr Donald Hall and Dr Herbert Eccleston It is believed to be the only one of its kind in Buffalo The service will be made available for any doctor who wishes to use it

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A total of 1,799 patients was admitted for treatment at Cohoes Hospital during 1947, according to a report prepared by Miss Elizabeth Lautermilch, hospital superintendent The report sets the total number of patients discharged from the hospital last year at 1,787 During the year 359 babies were born at the local institution, and 74 persons died there A total of 553 operations were performed at the hospital during the past year The report shows 200 major operations, 158 minor, and 173 for the removal of tonsils and adenoids

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An endowment fund in memory of Dr Emily Lewi has been given to New York Infirmary, New York City, by friends of Dr Lewi. Income from the fund will be used for the care of ailing women physicians connected with the infirmary and their children Dr Lewi, who died two years ago, was a pediatrician who practiced more than fifty years and served as director of pediatrics at the infirmary from 1930 to 1936 She was known as an outstanding teacher and diagnostician and was one of the pioneers in endocrinology

Dr John Garlock, attending surgeon, Mount Sinai Hospital, New York City, read a paper on "Carcinoma of the Gastrointestinal Tract" at the staff conference meeting of Boulevard Hospital, Long Island City, on May 27

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"Open house" was held at the North Country Community Hospital, Glen Cove, in May in order to show the people of the North Shore area how a large hospital operates, how diverse are its problems, and how immense its responsibilities Last year the hospital served 4,500 patients

Our Lady of Lourdes Memorial Hospital, Binghamton, is making a survey of 8,000 Triple City residents to gather opinion on the extent that the hospital should be expanded The survey is being conducted by a Community Relations Committee, of which John D Ross is chairman and which was appointed by the hospital's advisory board

Corinth Hospital has been equipped recently with x-ray and basal metabolism machines, Mrs Florence T Schermerhorn, supervisor, has announced The machines were donated by Dr Cecil Rogers, of Hadley, for the use of the hospital patients

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The board of directors of Olean General Hospital released statistics recently showing that the number of patients served has nearly doubled since 1940 The figures show that during 1940 the hospital served an average of 51 57 patients per day, and last year the average jumped to 91 32 patients per day While the number of beds and bassinets has remained at 109, in the years between 1940 and 1947 the total number of patients admitted annually has risen from 2,036 to 3,520 Emergency room cases have increased from 145 to 415, medical cases from 418 to 877, obstetric cases from 351 to 743, and babies cared for at the hospital from 328 to 864

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The equipment of Flushing Hospital, Queens, was demonstrated, and the five floors of the hospital were shown to thousands of visitors in observance of National Hospital Day in May A corps of volunteers conducted the inspection while staff members explained the work of various departments

PERSONALITIES

Honored

Dr Walter L Rathbun, superintendent of Newton Memorial Hospital, Cassadaga, was the guest of the board of managers and the hospital staff in May at a dinner celebrating his seventieth birthday Dr Nathan B Van Etten, upon his retirement as chairman of board of directors of United Medical Service, was presented with an illuminated scroll of the "enduring appreciation and affectionate regard of his fellow directors" at a combined meeting of the board of directors of Associated Hospital Service, held in New York City in May

Elected

Dr David P Barr, physician-in-chief of New York Hospital and professor of medicine at Cornell University Medical College, as president of the

[Continued on page 1526]

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[Continued from page 1524]

medical board of the hospital As president of the Public Health Association of New York City, Dr Iago Galdston, to succeed Dr John L Rice Dr Leonard Paul Wershub, re-elected president of the Alumni Association of New York Medical College and Flower and Fifth Avenue Hospitals, at the association's annual reunion on June 9 As officers of the medical staff of the Dobbs Ferry Hospital president, Dr G J Will, vice-president, Dr Harold A. Storms, and as secretary, Dr Vito Barbieri

Retired

Dr Russell E Blaisdell, after 42 years of service with the State Department of Mental Hygiene, as director of Rockland State Hospital, Orangeburg He opened the hospital in 1931 as its first and only director

Appointed

Dr Henry Nickerson Pratt, administrator of Memorial Hospital, New York City, since February, 1946, as director of New York Hospital As director of the newly merged obstetric and gynecologic services at Beth Israel Hospital, New York City, Dr Henry C Falk Dr Paul E RePass, Denver, Colorado, as radiologist at Binghamton City Hospital Dr Edward Furcinito, formerly lieutenant (jg) in the Medical Corps, USNR, as resident physician at the Oneida County Hospital, Utica As director of the department of dermatology at Stuyvesant Polyclinic Hospital, New York City, Dr Samuel M Kaufman Dr Israel Oscar Weissman, former assistant director of the Jewish Hospital, Brooklyn, as director of Sydenham Hospital, the interracially operated institution in Harlem, New York City

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ASKS "GOOD NEIGHBOR" MEDICAL SCHOOL

The U S should establish an international medical school as an effective demonstration of the "good neighbor policy," Dr Merl G Colvin of Williamsport, Pennsylvania, has told the A M A. He points out that medical missionaries like Schweitzer and Seagrave have done remarkable work but have had no means of perpetuating it Bring native young men and women to this country, says Doctor Colvin, and train them for work in their own lands Then, he said, the medical centers established by missionaries will thrive and expand —*Medical Economics, May 1948*

WORM DISEASE CAUSES FITS LIKE THOSE IN EPILEPSY

A worm disease that can cause fits like those in epilepsy and which may be mistaken for epilepsy or some mental trouble was reported by Lieut Col W H Hargreaves, medical liaison officer of the British Joint Services Mission, to the International Congress of Tropical Medicine and Malaria meeting in Washington

The disease is called cysticercosis and is caused by the larval form of pork tapeworm When the larvae get into the body they are surrounded in time by calcium These hard lumps or cysts may be found anywhere in the body They can sometimes be seen under the skin When they get in the brain they may cause fits

The condition may occur here in the United States or in any other country where pork tapeworms are found Col Hargreaves said He and Dr H B F Dixon screened every British Army veteran reported to have fits and found more than 300 of them had worm cysts in their brains Most of the men had seen service in India and apparently picked up the worm larvae there through contaminated food or drink

Individual worm cysts can often be located with x-rays and removed, even from the brain But since there are usually many of the cysts, this treatment is not very practical Some patients who were going blind because of the cysts were helped by a decompression operation

The disease has a low death rate, 8 per cent, and very few of the surviving patients show any signs of the disease getting worse More than a third are improving, and one-sixth, approximately, have recovered.—*Science News Letter, May 22, 1948*

SCHOOLS

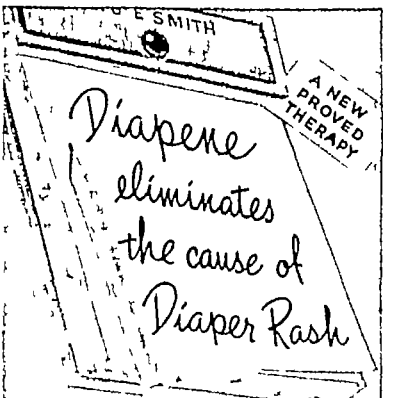
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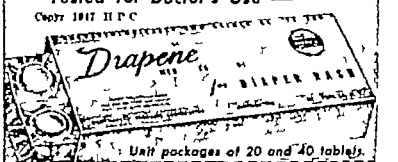
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BOOKS

Books for review should be sent to the Book Review Department at 1313 Bedford Avenue Brooklyn N Y Acknowledgement of receipt will be made in these columns and deemed sufficient notification. Selection for review shall be based on merit and interest to our readers

RECEIVED

Dermatology for Nurses By G H Percival, M D, and Elizabeth Toddie, S R N Octavo of 116 pages, illustrated Baltimore, Williams & Wilkins Co, 1947 Cloth, $4 50

The Treatment of Rheumatism in General Practice By W S C Copeman, M D Fourth edition Octavo of 258 pages Baltimore, Williams & Wilkins Co, 1946 Cloth, $4.00

A Text-Book of Bacteriology By R W Fairbrother, M D Fifth edition Octavo of 480 pages, illustrated New York, Grune & Stratton, 1948 Cloth, $6 00

A Manual of Clinical Therapeutics A Guide for Students and Practitioners. By Windsor C Cutting, M D Second edition Duodecimo of 712 pages, illustrated Philadelphia, W B Saunders Co, 1948 Cloth, $5 00

Minor Surgery By Frederick Christopher, M D Sixth edition Octavo of 1058 pages, illustrated Philadelphia, W B Saunders Co, 1948 Cloth, $12

A Manual of Pharmacology and its Applications to Therapeutics and Toxicology By Torald Sollmann, M D Seventh edition Quarto of 1132 pages Philadelphia, W B Saunders Co, 1948 Cloth, $11 50

Oxford Loose-Leaf Medicine, Supplements 16 reprints Octavo New York, Oxford University Press 1947 Available only to subscribers

Operative Gynecology By Harry Sturgeon Crossen, M D, and Robert James Crossen, M D Sixth edition Quarto of 999 pages, illustrated St Louis, C V Mosby Co, 1948 Cloth, $15

Diseases of Children's Eyes. By James Hamilton Doggart, M.D Octavo of 288 pages, illustrated St Louis, C V Mosby Co, 1947 Cloth, $10

The Medical Clinics of North America. Chicago Number January, 1948 Octavo Philadelphia, W B Saunders Company, 1948 Published Bi-Monthly (six numbers a year) Cloth, $16 net, Paper, $12 net

Modern Treatment of Peptic Ulcer By Asher Winkelstein, M D Octavo of 205 pages, illustrated New York, Oxford University Press, 1948 Cloth, $4 00

A Textbook of Dietetics. By L S P Davidson, M D, and Ian A Anderson, M B (Aberd) With Diet Sheets constructed by Miss Mary E Thomson, S R.N Second edition Octavo of 517 pages, illustrated New York, Paul B Hoeber, 1947 Cloth, $6 00

Brief Psychotherapy A Handbook for Physicians on the Clinical Aspects of Neuroses By Bertrand S Frohman, M D With the collaboration of Evelyn P Frohman. Large duodecimo of 265 pages Philadelphia, Lea & Febiger, 1948 Cloth, $4 00

The Rh Factor In the Clinic and the Laboratory Special Issue No 2 of Blood, The Journal of Hematology Joseph M Hill, M D, and William Dameshek, M D, editors Large octavo of 192 pages, illustrated New York, Grune & Stratton, 1948 Cloth, $4.25

Dermatologic Therapy in General Practice By Marion B Sulzberger, M.D, and Jack Wolf, M D Third edition Large duodecimo of 663 pages, illustrated Chicago, Year Book Publishers, 1948 Cloth, $7 75

Private Enterprise or Government in Medicine By Louis Hopewell Bauer, M D Octavo of 201 pages Springfield, Charles C Thomas, 1948 Cloth, $5 00

Occupational Medicine and Industrial Hygiene By Rutherford T Johnstone, M D Octavo of 604 pages, illustrated St Louis, C V Mosby Co, 1948 Cloth, $10 00

Hernia. Anatomy, Etiology, Symptoms, Diagnosis, Differential Diagnosis, Prognosis, and Treatment. By Leigh F Watson, M D With illustrations by Helen Lorraine, Willard C Shepard, and Ralph Sweet Third edition Octavo of 732 pages, illustrated St Louis, C V Mosby Co, 1948 Cloth, $13 50

The Discovery of the Orgone Volume 2 The Cancer Biopathy By Wilhelm Reich, M D Translated by Theodore P Wolfe, M D Octavo of 409 pages, illustrated New York, Orgone Institute Pr, 1948 Cloth, $8 50

Nutrition in Health and Disease By Lenna F Cooper, M A, Edith M Barber, M S, and Helen S Mitchell, Ph D Tenth edition Octavo of 729 pages, illustrated Philadelphia, J B Lippincott Co, 1947 Cloth, $4.00

Psychiatry for the Pediatrician By Hale F Shirley, M D Octavo of 442 pages New York, Commonwealth Fund, 1948 Cloth, $4 50

Treatment in General Practice By Harry Beckman, M D Sixth edition Octavo of 1,129 pages, illustrated Philadelphia, W B Saunders Co, 1948 Cloth, $11 50

Transactions of the Fifth Meeting, Conference on Liver Injury, September 26–27, 1946, New York, N Y F W Hoffbauer, M D, editor Octavo of 127 pages, illustrated New York, Josiah Macy, Jr, Foundation, n d Paper, $2 25

Transactions of the Sixth Conference on Liver Injury, May 1–2, 1947, New York, N Y F W Hoffbauer, M D, Editor Octavo of 74 pages, illustrated New York, Josiah Macy, Jr, Foundation, n d Paper, $2 00

Transactions of the First Conference on Factors Regulating Blood Pressure, April 24–25, 1947, New York, N Y B W Zweifach, Ph.D, and Ephraim Shorr, M D, editors Octavo of 175 pages, illustrated New York, Josiah Macy, Jr, Foundation, n d Paper, $1 90

Communicable Disease Control By Gaylord W Anderson, M D, and Margaret G Arnstein, R N Second edition Octavo of 450 pages, illustrated New York, Macmillan Co, 1948 Cloth, $5 00

Rheumatism and Soft Tissue Injuries. By James Cyriax, M D Octavo of 410 pages, illustrated New York, Paul B Hoeber, 1948 Cloth, $9 50

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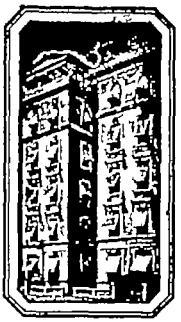
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[Continued from page 1528]

A Correlative Study of Cyclic Changes By George N Papanicolaou, M D, Herbert F Traut, M D, and Andrew A Marchetti, M D Quarto of 96 pages, illustrated New York, Commonwealth Fund, 1948 Cloth, $10

Skeletal Tuberculosis By Vicente Sanchis-Olmos, M D Translated by John G Kuhns, M D Octavo of 261 pages, illustrated Baltimore, Williams & Wilkins Co, 1948 Cloth, $5 00

Clinical Toxicology By Clinton H Thienes, M D, and Thomas J Haley, Ph D Second edition Duodecimo of 373 pages, illustrated Philadelphia, Lea & Febiger, 1948 Cloth, $4 75

Between Us and the Dark. By Lenore McCall Octavo of 303 pages Philadelphia, J B Lippincott Co, 1947 Cloth, $3 00

Headache and Other Head Pain By Harold G Wolff, M D Octavo of 642 pages, illustrated New York, Oxford University Press, 1948 Cloth, $12

Pathology of Tumors By R. A Willis, M D Octavo of 992 pages, illustrated St Louis, C V Mosby Co, 1948 Cloth, $20

Progress in Clinical Medicine By Various Authors Edited by Raymond Daley, M D, and Henry G Miller, M D Octavo of 356 pages, illustrated New York, Grune & Stratton, 1948 Cloth, $6 00

Atlas of Plastic Surgery By Morton I Berson, M D Quarto of 304 pages, illustrated New York, Grune & Stratton, 1948 Cloth, $15

Nuremberg Diary By G M Gilbert, Ph D Octavo of 471 pages New York, Farrar, Straus & Co, 1947 Cloth, $5 00

Source Book of Orthopaedics By Edgar M Bick, M D Second edition Octavo of 540 pages, illustrated Baltimore, Williams & Wilkins Co, 1948 Cloth, $8 00

Mental Health in Modern Society By Thomas A C Rennie, M D, and Luther E Woodward, Ph D Octavo of 424 pages New York, Commonwealth Fund, 1948 Cloth, $4 00

Psychobiology and Psychiatry. A Textbook of Normal and Abnormal Human Behavior By Wendell Muncie, M D Second edition Octavo of 620 pages, illustrated St Louis, C V Mosby Co, 1948 Cloth, $9 00

REVIEWED

Methods of Diagnosis By Logan Clendening, M D, and Edward H Hashinger, M D Octavo of 868 pages, illustrated St Louis, C V Mosby Co, 1947 $12 50

Methods of Diagnosis by the late Dr Clendening was brought out after his death by his coworker, Dr Edward H Hashinger It is excellently written by a master clinician in direct, colorful language The first part of 76 pages deals with a discussion of logic in diagnosis and is worth the price of the book Parts 2 and 3 are of great value in the appreciation of history and physical examination Part 4 deals with laboratory and special procedures, which include usual simple laboratory tests and their value together with excellent discussions of x-ray diagnosis, electrocardiogram, basal metabolism, and instrumental examination of the eye, ear, larynx, bronchus, esophagus, lower bowel, and stomach The book is well printed, easy to read, and contains an excellent index It can be highly recommended to medical students and to general practitioners

MEYER A RABINOWITZ

Sex Education A Guide for Parents, Teachers and Youth Leaders By Cyril Bibby, M Sc Duodecimo of 311 pages New York, Emerson Books, 1946 Cloth, $2 50

This is an excellent treatise on child guidance from an early age to and after marriage It tells of the pitfalls which assail the growing child in his acquisition of sex and health knowledge There has been in past years too much of a hush policy in dealing with the facts of life, but *Sex Education* gives a clear idea as to how to deal with the instruction of developing youth This book is not for casual readers but is a textbook for students of medicine, social workers, school teachers, both lay and religious

ARTHUR D JAQUES

Heparin in the Treatment of Thrombosis An Account of Its Chemistry, Physiology and Application in Medicine By J Erik Jorpes, M D Second Edition Octavo of 260 pages, illustrated, New York, Oxford University Press, 1946 Cloth, $6 50

This is the second edition of an excellent monograph on chemistry, physiology, and clinical applications of heparin The author, a pioneer investigator of heparin, has expanded on the first edition, both by bringing it up to date and by widening the discussion, particularly of clinical problems The style is clear, the bibliography is well chosen

ARTHUR SHAPIRO

What Is Heart Disease A Handbook for the Heart Patient. By William Hyatt Gordon, M D Duodecimo of 114 pages, illustrated New York Grune & Stratton, 1946 Cloth, $2 50

This excellent book for the layman is written, not to supplant attending physicians' advice, but to make patient and doctor find a common meeting ground The sample diet lists should not be in the book, as they may tend to have the patient follow the diet without consulting his doctor

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Except for the chapter on diets, this book is recommended for the layman

VINCENT ANNUNZIATA

Massage and Remedial Exercises. In Medical and Surgical Conditions By Noel M Tidy Seventh edition Octavo of 480 pages, illustrated Baltimore, Williams & Wilkins Co, 1947 Cloth, $6 00

This well-written work should prove helpful to nursing personnel and other technical physical medical aides, both as a text and a reference Some physicians might consider it too elementary for their uses, nevertheless this reviewer recommends it as a valuable and excellent book even for their perusal

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1 Stuart, H C. Effects of Protein Deficiency on the Pregnant Woman and Fetus and on the Infant and Child, New England J Med 236 507 (Apr 3) 1947

2 Zeigler, R F , Jr Pre eclamptic Toxemia of Pregnancy North Carolina M J 8 655 (Oct) 1947

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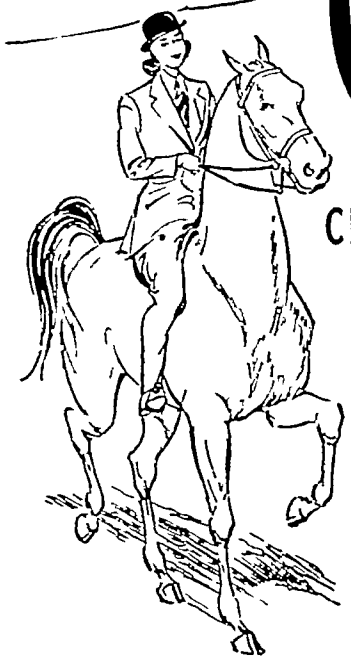
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CONTENTS

SCIENTIFIC ARTICLES

Dynamic Therapeutics in Chronic Disease, *Howard A Rusk, M D* 1579
The Advantages of a Service Contract for Low-Income Subscribers, *Milton J Goodfriend, M D, F A C S* 1583
Benefits Offered by the Voluntary Nonprofit Medical Care Plans of New York State, *Carlton E Wertz, M D* 1585
Differential Diagnosis of Pulmonary Lesions, *Stanley B Clark, M D* 1587
Success with Oral Mercurial Diuretic, *Harry A Solomon, M D*, and *Albert Abraham, M D* 1593
Tolerance Studies of the Antihistamine Drug Thephorin, *Linn J Boyd, M D, Jonas Weissberg, M D*, and *Thomas H McGavack, M D* 1596
Rectal Polyps Showing Early Malignant Transformation, *Henry Pesksn, M D* 1599
X-Ray Injuries The Preventable Occupational Hazard, *Shirley J DeVoe, M D*, and *George M Corney, B A* 1601
Severe Diabetic Acidosis with Extreme Low Carbon Dioxide Combining Power, *Joseph C Watts, M D, A J Aptaker, M D*, and *James R Reuling, M D, F A C P* 1603
Photosensitization Therapy of Acne Vulgaris, *Abner Kurtin, M D*, and *Reuben Yontef, M D* 1606
Value of Urography in Elucidation of Nonurologic Complaints, *Allan K Swerstie, M D* 1607

(*Continued on page 1540*)

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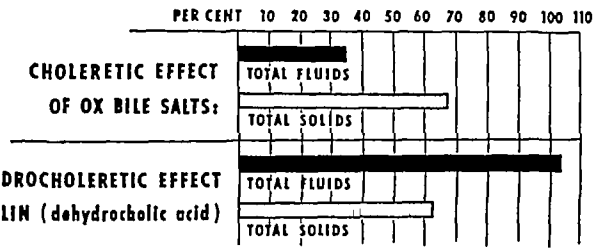
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(*CONTENTS—Continued from page 1538*)

SPECIAL ARTICLE

The New York State Medical Library's Services to Physicians, *prepared by Maude E Nesbit* 16

CASE REPORTS

Erythema Multiforme Bullosa (Stevens-Johnson Type), *Abraham Nathan, M D , Paul J Cameron, M D* , and *Carl Zelson, M D* 16
The Management of Diabetes Complicated by Tuberculosis, *Morris Ant, M D* , and *Robert A Love, M D* 16
Diverticulitis of the Rectosigmoid with Acute Obstruction Caused by Associated Intussusception, *George M Saypol, M D* , and *Mack Lipkin, M D* 16
Coexistence of the Wolff-Parkinson-White Syndrome and Organic Heart Disease, *Seymour H Ranzler, M D* 16
Myelogenous Leukemia Resulting from Benzol Poisoning, *Joseph D Sacca, M D* 16
Leiomyofibroma of the Fallopian Tube, *Sydney W Stringer, M D* 16
Congenital Malformation of the Esophagus without Tracheo-esophageal Fistula, *James R Lisa, M D* , and *Helen M Taylor, M D* 16

EDITORIALS

The Annual Meeting, 1948 1575
Cancer Detection Clinics 1576
Current Editorial Comment 1577

GENERAL FEATURES

Necrology 1625
Hospital News 1627
Medical News 1630
Books 16

MISCELLANEOUS

State Society Officers 1542, 1544, 15
Abstract of Minutes of the Council of the Medical Society of the State of New York 16
Correspondence 16
County Society Officers 16



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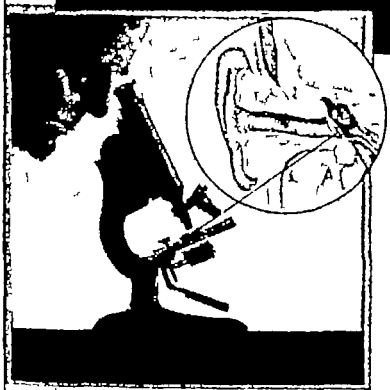
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1 Couch J F Krewson C F, Naghski J and Copley M J : Bureau of Agriculture and Industrial Chemistry U S Dept of Agriculture A I C 115 (1946)

2 Griffith J Q , Jr Couch J F and Lindauer M A : Proc. Soc Biol and Med 55:228 (1944)

3 Zfass H S : Virg Med Monthly 74:56 (1947)

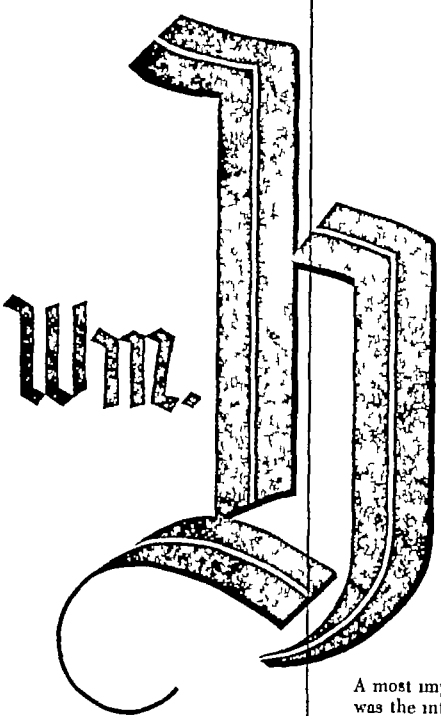
4 Shanno R H Griffith J Q Jr and LaMotte, W , Jr : Scientific Exhibit Medical Society of State of Penna Phila Oct 7 10 (1946)

5 Strean L P Dental Items of Interest 70:153 (1948)

6 U S Dept of Agriculture Agricultural Research Administration Washington Letter, January 24 (1946)

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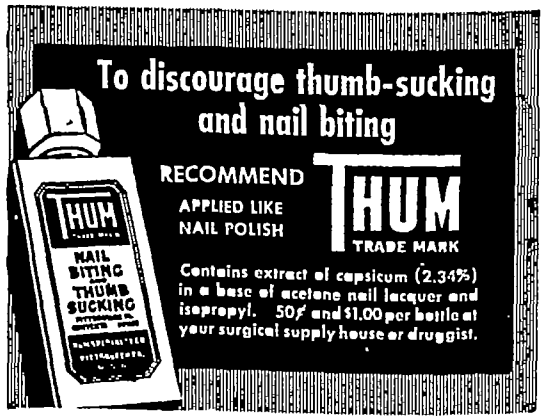
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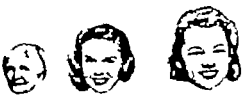


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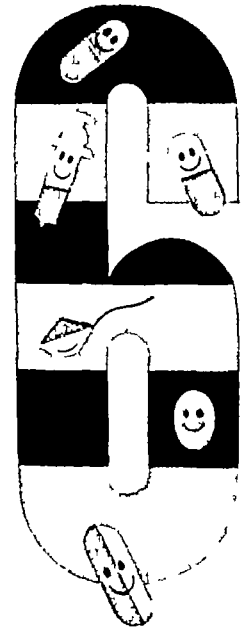
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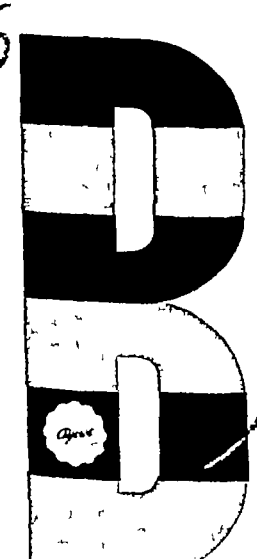


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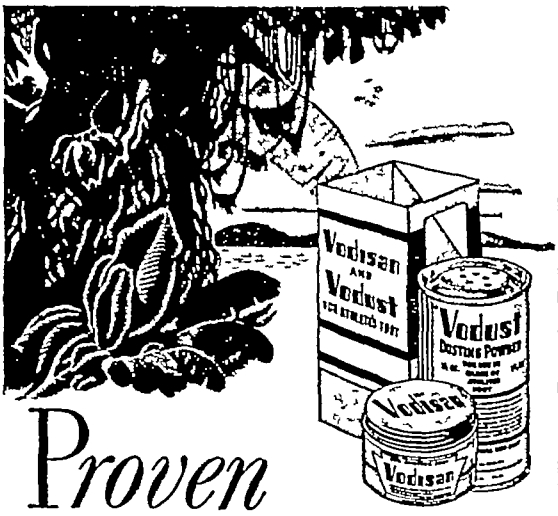
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INDEX TO ADVERTISERS

Ames Company Inc.	1539
The Arlington Chemical Company	1554
Ayerst, McKenna & Harrison Limited	1549
Dr Barnes Sanitarium	1641
Beech-Nut Packing Company	1563
Borcherdt Malt Extract Company	1641
Brewer & Company Inc	1639
Brigham Hall Hospital	1641
Brunswick Home	1641
S H Camp and Company	1556
Carnation Company	1547
G Ceribelli & Co	1645
Ciba Pharmaceutical Products Inc	3rd cover
Copiague General Hospital	1643
Crane Discount Corporation	1546
The Doho Chemical Corporation	1543
H. E Dubin Laboratories Inc.	1564
Falkirk in the Ramapos	1643
Fried & Kohler, Inc	1535
Froben Press Inc.	1560
Grant Chemical Co Inc	1565
Greenwich Village Beverages Inc	1568
Halcyon Rest	1643
J E Hanger Inc	1560
Harmon Chemicals Inc.	1508
Holbrook Manor	1643
Holland-Rantos Company Inc.	1558
Homemakers Products Corporation	1568
Interpines	1643
Lakeside Laboratories Inc	1571
Eli Lilly and Company	1574
Louden-Knickerbocker Hall Inc.	1643
M & R Dietetic Laboratories, Inc	1560
Mandl School	1644
The Maples Inc	1641
Mead Johnson & Company	4th cover
Merck & Co Inc.	1562
The Wm. S. Merrell Company	2nd cover
National Confectioners Association	1536
Nepera Chemical Co Inc.	1557
New York Medical Exchange	1641
Novocol Chemical Mfg. Co Inc.	1544
Num Specialty Co	1546
Paine Hall	1644
Parke, Davis & Company	1555
Pediforme Shoe Co	1560
Rexall Drug Company	1572
R. J Reynolds Tobacco Co	1537
Wm. S Rice Inc.	1564
Sandoz Chemical Works Inc.	1540
Saratoga Springs Authority	1552
Schering Corporation	1551, 1567
Schieffelin & Co	1538
Julius Schmid Inc.	1570
G D Searle & Co	1545
E R. Squibb & Sons	1548
Standard Pharmaceutical Co Inc.	1646
The Tarbonis Company	1553
Teca Corporation	1542
Charles B Towns Hospital	1643
Twin Elms	1643
Van Patten Pharmaceutical Co	1560
Varick Pharmacal Company	1646
Vodine Company	1550
The Wander Company	1573
West Hill	1641
Westwood Pharmacal Corp	1561
Winthrop-Stearns Inc	1541, 1559
Wyeth Incorporated	1569



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1 Leb D Proc. Soc. E per Biol. & Med 64:393, 1917

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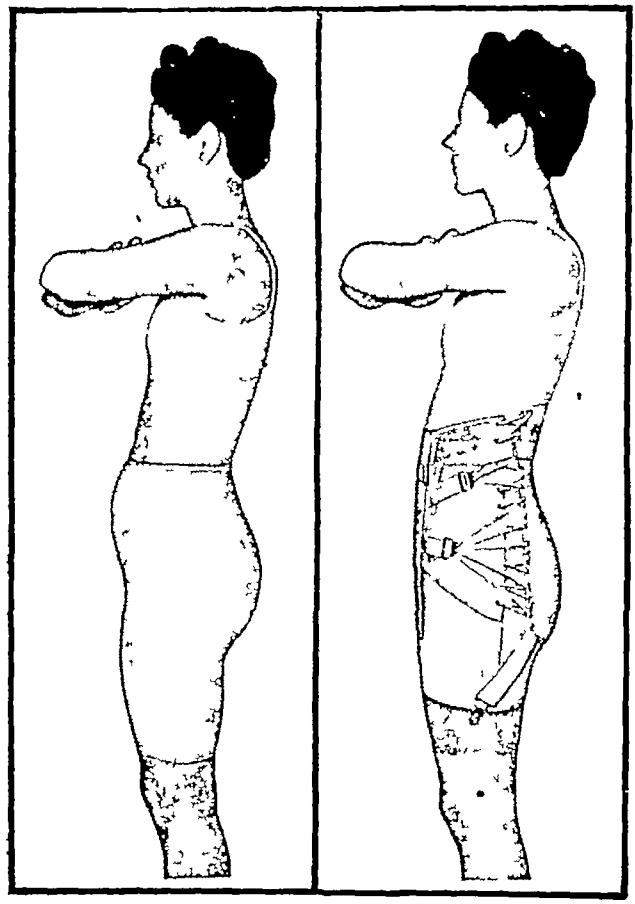
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*MANDELAMINE is the registered trademark of Nepera Chemical Co., Inc., for its brand of Hexydaline

1 Dees, C. J. and Scudi, J. V. Proc. Soc. Exper. Biol. & Med. 66 123 (1947)
2. Scudi, J. V. and Dees, C. J., J. Urol. (to be published)

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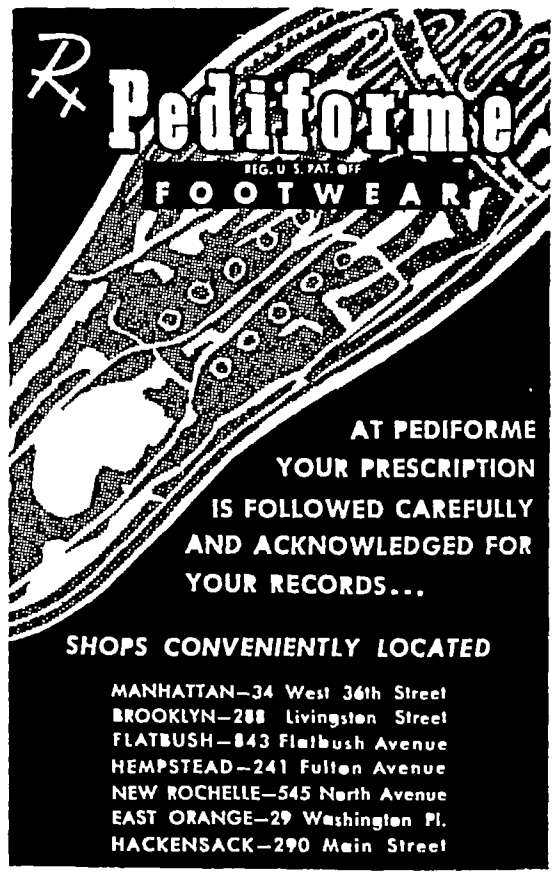
TABLE OF CONTENTS

I American Pioneers in Abdominal Surgery
II Amputations & Protheses through the Centuries
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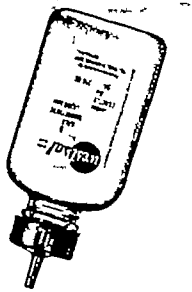
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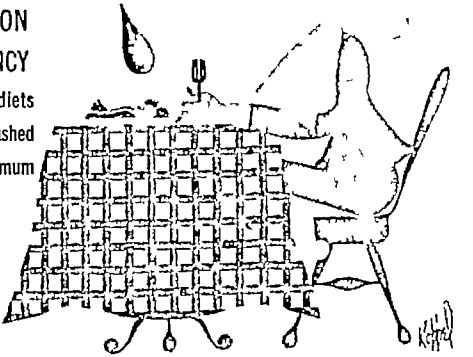
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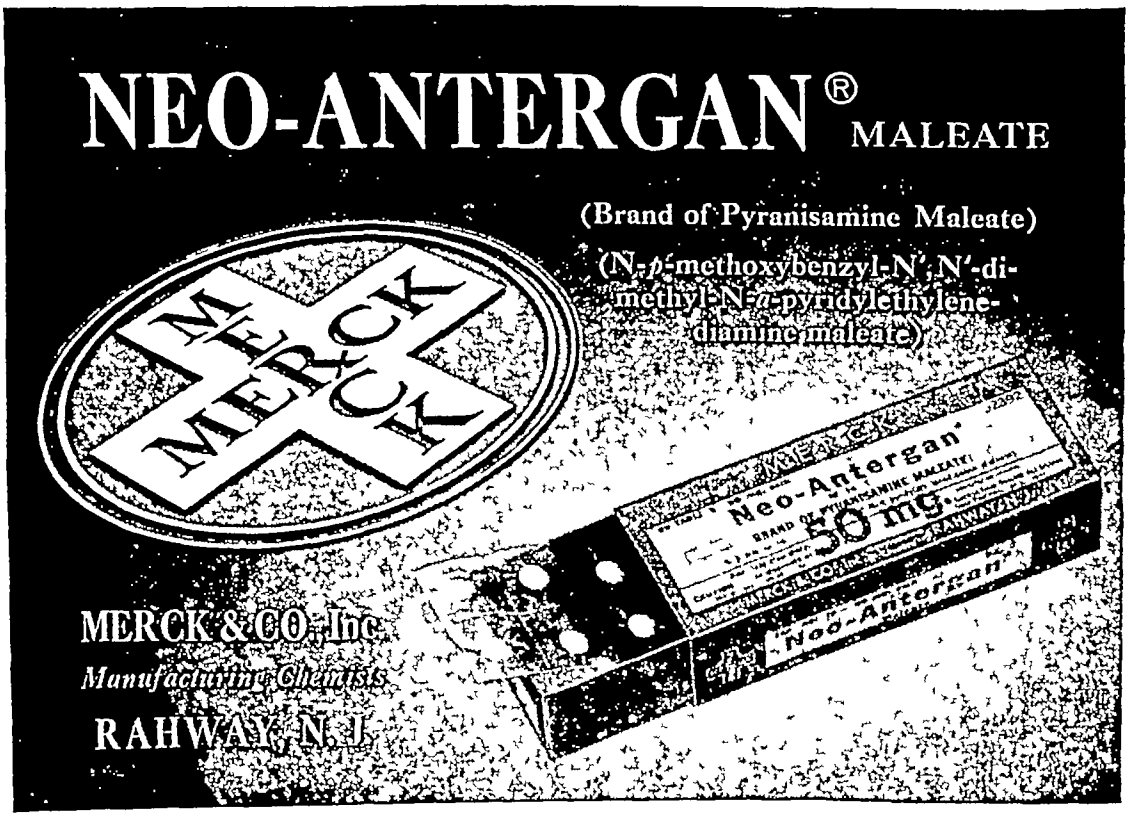
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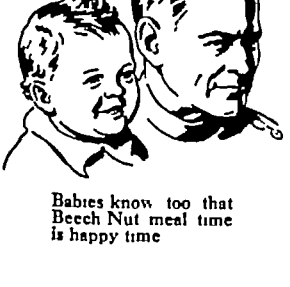
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INDEX TO ADVERTISED PRODUCTS

Aminophyllin (H E Dubin Laboratories, Inc) 1564
Aminophyllin (G D Searle & Co) 1545
Auralgan (The Doho Chemical Corporation) 1543
Bellergal (Sandoz Chemical Works, Inc) 1540
Beminal (Ayerst, McKenna & Harrison Limited) 1549
Benadryl (Parke, Davis & Company) 1555
Combisul (Schering Corporation) 1551
Crysticillin (E R. Squibb & Sons) 1548
Decholin (Ames Company, Inc) 1539
Des (Grant Chemical Co, Inc) 1565
Devegan (Winthrop-Stearns Inc) 1559
Diapene (Homemakers' Products Corporation) 1568
Digitaline Nativelle (Varick Pharmacal Company) 1646
Estivin (Schieffelin & Co) 1538
Harplex (Harmon Chemicals, Inc) 1568
Koromex (Holland-Rantos Company, Inc) 1558
Mandelamine (Nepera Chemical Co, Inc) 1557
Mercuhydrin (Lakeside Laboratories, Inc) 1571
Neo-Antergan (Merck & Co, Inc) 1562
Neo-Synephrine (Winthrop-Stearns Inc) 1541
Nitramitol (The Wm S Merrell Company) 2nd cover
Nucarpon (Standard Pharmaceutical Co, Inc) 1645
Poison Ivy Extract (The Arlington Chemical Company) 1554
Pyribenzamine (Ciba Pharmaceutical Products, Inc) 3rd cover
Ramses (Julius Schmid, Inc) 1570
Scorutone (Novocol Chemical Mfg Co, Inc) 1544
Sodascorbate (Van Patten Pharmaceutical Co) 1560
Sopronol (Wyeth Incorporated) 1569
Surfacaine (Eli Lilly and Company) 1574
Tarbonis (The Tarbonis Company) 1553
Thesodate (Brewer & Company, Inc) 1639
Thum (Num Specialty Co) 1546
Trimeton (Schering Corporation) 1567
Vodisan-Vodust (Vodine Company) 1550
Westsal (Westwood Pharmacal Corp) 1561

Dietary Foods

Baby Foods (Beech-Nut Packing Company) 1563
Evaporated Milk (Carnation Company) 1547
Malt Soup Extract (Borcherdt Malt Extract Company) 1641
Ovaltine (The Wander Company) 1573
Pabena (Mead Johnson & Company) 4th cover
Similac (M & R Dietetic Laboratories, Inc) 1566

Medical & Surgical Equipment

Artificial Eyes (Fried & Kohler, Inc) 1535
Artificial Limbs (J E Hanger, Inc) 1560
Hydrogalvanic Generators (Teca Corporation) 1542
Orthopedic Shoes (Pediforme Shoe Co) 1560
Supports (Wm. S Rice, Inc) 1564
Supports (S H Camp and Company) 1556

Miscellaneous

Books (Froben Press, Inc) 1560
Brioschi (G Ceribelli & Co) 1645
Candy (National Confectioners Association) 1536
Cigarettes (R. J Reynolds Tobacco Co) 1537
Milk Stout (Greenwich Village Beverages, Inc) 1568
Petechiometer (Rexall Drug Company) 1572
Spring Water (Saratoga Springs Authority) 1552

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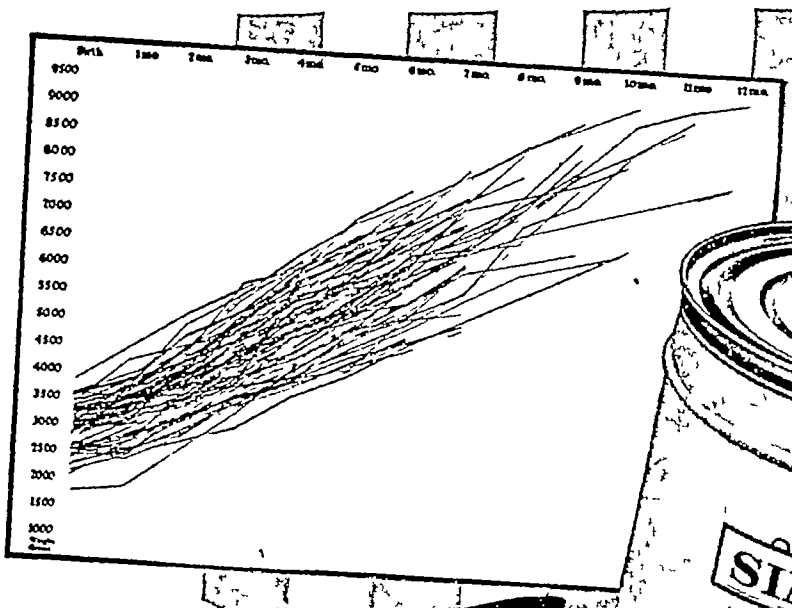
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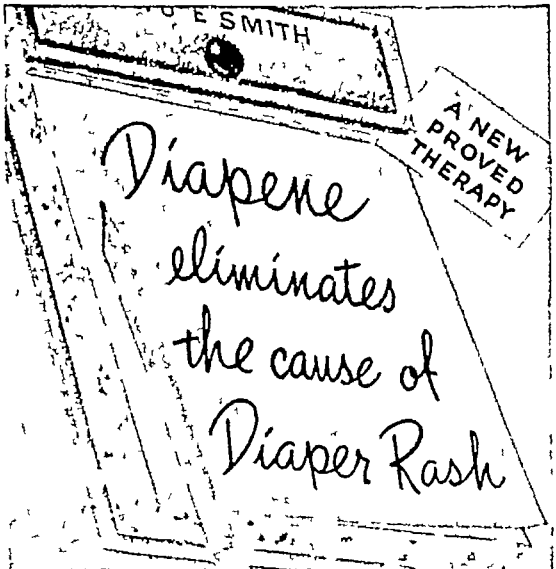
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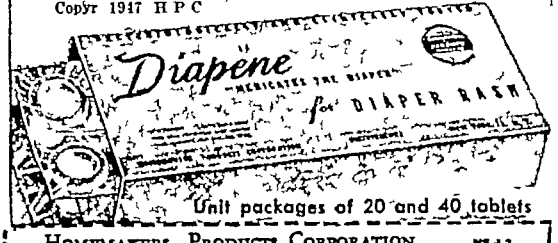
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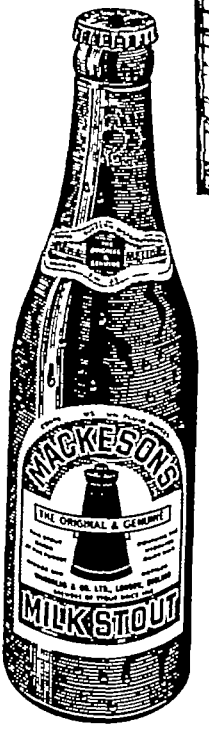
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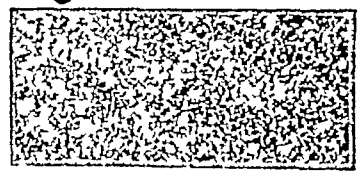


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Fishberg, A. M.: Heart Failure 2nd Ed. Phila. Lea & Febiger 1946 p 722.

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The Treatment of Hypertension, editorial, J. A. M. A. 133:578 (Nov. 1) 1947

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Dowman M. A.: New York Stat. J. Med. 45:1758 (Aug. 15) 1945.

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Modell, W., Gold, H. and Clarke, D. A. J. Pharm. & Exper. Therap. 84:284 (July) 1945.

- "The authors favor the administration of mercury intramuscularly rather than intravenously and for this purpose employ preparations such as MERCUHYDRIN"

Thorn, G. W. and Tyler, F. H. Med. Clin. North America (Sept.) 1947 p. 1681.

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Chapman, D. W. and Shaffer, C. F.: Arch. Internal Med. 78:449 1947

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Walser, F. A. Grace Hospital Bulletin, Detroit (Jan.) 1947 p. 25.

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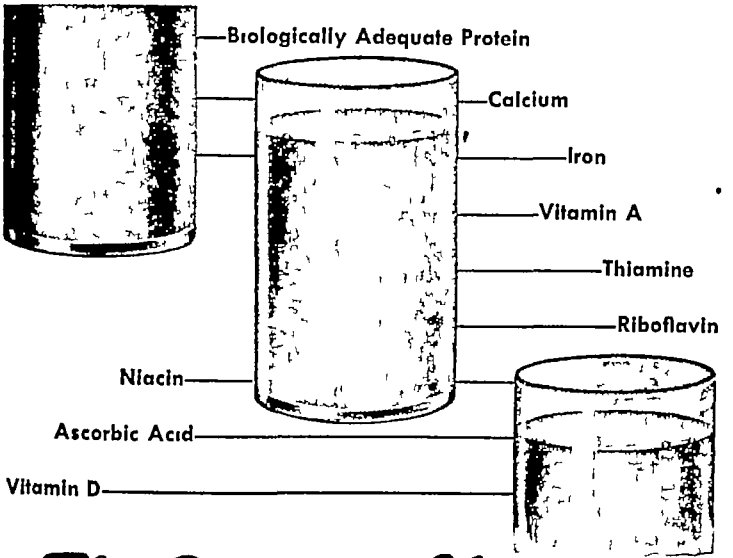
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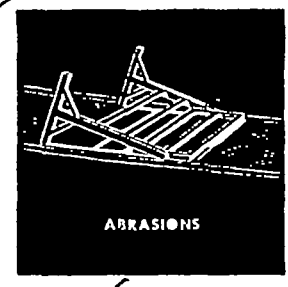
Ointment 'Surfacaine,' 1 percent, in 1 oz tubes with removable rectal tips, and in 1 lb and 5 lb packages

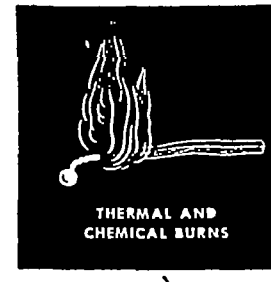
Jelly 'Surfacaine,' 0.25 percent, in 1-oz tubes

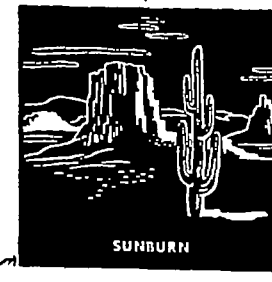
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NEW YORK STATE JOURNAL OF MEDICINE

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Editorials

The Annual Meeting, 1948

The one hundred forty-second annual meeting of the Medical Society of the State of New York, recently concluded, was attended by more than 6,000, of whom 5,201 were physicians This is the largest total attendance recorded at any annual meeting thus far

The House of Delegates, faced with an overwhelming mass of business to transact, was called to order Monday, May 17, by Dr Louis H Bauer, president of the Society, and thereafter the one hundred and forty-second annual meeting proceeded with the regular order of legislative, scientific, and educational work.

Invited guests were introduced who spoke briefly, principally on the subject of the development of emergency medical service for the region, the State, and the Nation. Resolutions were then received, those of greatest importance dealing with the establishment of Red Cross nation wide blood donor service, hospital expansion by the Veterans Administration, the World Health Organization, the Health Insurance Plan for Medical Service in New York City, and discrimination This year for the first time the JOURNAL will probably print the complete minutes of the House of Delegates as a supplement to one of the subsequent regular issues with an index for the convenience of members of the Society in referring to the transactions. The minutes will then be concentrated in one place instead of being scattered through a number of issues.

The Teaching Day arranged by the Council Committee on Public Health and Education, was held on Tuesday, May 18, and was devoted to nutrition, rehabilitation and physical medicine, modern trends in medical care, and a round table conference on Medical Care Insurance in New York State Participation in this program was large and active, indicating a vivid interest in the subjects under discussion A lengthy executive session of the House of Delegates was also held

The final session of the House on Wednesday, May 19, concluded with the election of Dr John J Masterson of Brooklyn as president-elect and the installation of Dr Leo F Simpson of the County of Monroe as

president The annual banquet featured an address by Dr Roger I Lee of Boston, a past president of the American Medical Association, and also the presentation of the Society's medal to Dr Louis H Bauer of the County of Nassau, retiring president

The Society is to be congratulated on the better arrangement of space this year in comparison with that of two years ago The 75 scientific exhibits were well placed, easily reached, and were of more than ordinary interest Graphic illustration of the historic and scientific work basic to the present preparation and distribution in New York State of BCG attracted the attention of many physicians who will be more and more concerned with the clinical application of the new modality to tuberculin negative reactors

Appearing also for the first time were charts presenting the nature and production of radioactive isotopes and their use in biology and medicine, showing also measurement of isotope quantity and radiation dosage, safety precautions in the use of isotopes, the making of radioautographs, and tracer and therapeutic uses of various isotopes

Where new materials and procedures are shown, the advantage of an attended exhibit becomes manifest We urge that, whenever possible, scientific exhibitors arrange to have someone qualified to answer questions present as much of the time as can be arranged during the meeting

The 127 technical exhibits in 141 booth spaces were well arranged and interesting When it is remembered that without the technical exhibitors the meeting would have to be financed by the dues of members alone, the important contribution of the exhibitors will be appreciated

Section meetings were well attended, and the space available this year was adequate to avoid crowding The large number of scientific motion pictures shown attested to the growing importance of this art in the teaching of medical subjects

Cancer Detection Clinics

In response to the propaganda for the early detection of cancer as an important factor in the reduction of mortality from this disease, diagnostic centers have been established in communities all over the country Their founding has captured the public imagination, their waiting rooms are crowded to such an extent that there is much delay and inconvenience to their clients, with the inevitable result that many ill and disappointed individuals fail to return Numbers of people have developed a cancer phobia, yet if it will make them resort to regular, general, physical examinations, so much the better While cancer is claimed to be the second most frequent cause of death, it still constitutes only a small portion of human illness An individual physician may meet with only a few cases a year, allowing perhaps for a few that may escape his attention Yet, no matter how small the number, it would be well to know of their existence and apply available remedial measures in time

Cancer detection centers and clinics are organized mainly to detect the disease, the applicant is then referred to the family physician or a hospital if a suspicious lesion is found However, merely finding a suspicious lesion by visual means alone, on vaginal examination for example, is both unsatisfactory and insufficient Most gynecologists will agree that a cytologic test or, better, a biopsy is necessary R R Newell has stated that one investigator found only three early cases of cervical cancer in 6,000 pelvic examinations, and that more than 800 symptomless persons over forty-five years of age had to be fluoroscoped in order to find one gastric cancer [1] This is indicative of a vast expenditure of time and effort, and it means, moreover, that a person of experience is essential in making an adequate diagnosis

It must be evident that the mere multiplication of cancer detection centers is not the complete answer to the problem Uniform standards must be developed Centers must be manned not only by competent

[1] News Letter of the American College of Radiology, Vol 3, July 1947

personnel but must also be prepared to make smears and biopsies and to interpret them properly This might be resented by practicing physicians who are bound to acknowledge, however, that unless practitioners develop the necessary skills themselves, people will resort to the much-advertised centers and clinics. Postgraduate instruction of the individual physician is essential, therefore, and our own State Society Committee on Health and Education among others is providing for such instruction. Its endeavors should be supported and a cooperative effort instituted among doctors, hospitals, and clinics to evaluate and care for these patients scientifically Halfway measures will not suffice

Malignant disease is stated to be on the increase Is this increase actual or is it due to the fact that more cases are recognized by the means already at hand? At present, early surgical attack or radiation is indicated for control in certain cases until we know more about the cause of the disease and until other effective means of treatment have been devised In time, properly conducted research may provide this needed information, but until we know more about this disease, the means for its early recognition provide the best hope for successful early treatment. Efforts by the profession must be concentrated on careful, periodic, general physical examinations to disclose not only specific but all other abnormal conditions. To this end the general practitioner, in particular, must develop his special skills and convince people that in these skills the public is best served Naturally, it will be an uphill job, but time will prove its advantages

Current Editorial Comment

Hormone Therapy for Breast Cancer Is Still Experimental The Therapeutic Trials Committee of the Council on Pharmacy and Chemistry[1] warns of the grave dangers associated with the treatment of mammary cancer with estrogens and androgens These are palliative and experimental, *not curative*. The approved treatment of curable lesions is radical surgery, with or without roentgen radiation While there is hope of cure, give no hormones. The palliative symptomatic relief of hormone therapy should be reserved for patients whose disease has progressed beyond the possibility of cure

Within those limitations, estrogens and androgens may be given with some hope of symptomatic relief in cases selected carefully Androgen may be administered, regardless of the age of the patient with metastatic lesions of the bones The dose is 100 mg of *testosterone propionate* parenterally three times a week for ten weeks, followed by a maintenance dose of 60 mg of *methyl testosterone a day for ten weeks* In responsive patients, after two or three weeks, pain decreases, the appetite improves, weight increases, sleep becomes natural, there is renewed interest in life, and a general improvement comparable to that following castration in cases of cancer of the prostate. Androgen usually has no influence on the primary malignant disease of the breast or on soft tissue metastases in older women, it has masculinizing effects, often causes a disturbing increase in sexual libido, and it should be used cautiously in women with a high serum calcium

Estrogen therapy in mammary cancer has been found most beneficial in lesions of the soft tissues in older women. Regressions following estrogen treatment have been noted in the primary tumor, soft tissue recurrences, and in lymph node and pulmonary metastases. Other temporary benefits include occasional relief of pain in osseous metastases, a sense of well-being, improved hemopoiesis, a better appetite, and gain in weight The dose of estrogen usually is 10 to 15 mg of diethylstilbestrol a day Estrogen therapy for carcinoma of the breast should never be given to any patient who still menstruates or who has menstruated within a period of five years It accelerates the rate of growth of the carcinoma. For estrogen therapy, the most suitable patients are those above the age of 60

In brief, hormone therapy has limited symptomatic usefulness in hopeless cases of cancer of the breast androgen for lesions of the bones, and estrogen for lesions of the soft tissues

[1] Council on Pharmacy and Chemistry Report of the Council Estrogens and Androgens in Mammary Cancer J.A.M.A. 135: 987 (Dec. 18) 1947

Comparison of the Effects of Margarin and Butter on the Weight and Height of Children In a recent report, Leichenger *et al* give valuable information concerning the relative merits of margarin and butter The comparative value of those two forms of dietary fat (one of vegetable, the other of animal origin) was shown by tests for their effects on the height and weight of 267 white children between the ages of two and seventeen years, over a period of two years [1] The final study of records included 160 in the margarin group and 107 in the butter group

The diet was carefully supervised by trained dietitians, and regulated so that 25 to 30 per cent of the total calories were supplied by fat of which (in the margarin group) about two thirds was margarin The margarin used contained no fat from animal sources, and was fortified with 15,000 units of vitamin A per pound, more than the average amount in butter Under medical supervision, all the children in both groups were weighed and measured each month The results of blood studies were without significance since all figures, before as well as at the end of the test period, were within normal limits

The detailed data concerning height and weight, set forth in six tables, indicate that fortified margarin, containing only vegetable fats, and butter are equally valuable in sustaining growth and promoting health The authors make no claim that those in the margarin group were healthier simply because their diet contained margarin A comparison, however, of the degree of good health of each group and of the infirmary record of each group, shows much better conditions among the children served margarin

[1] Leichenger Eisenberg and Carlson J A M A 136 388 (Feb 7) 1948

Radiation Hazards —Attention may well be directed to an article in this issue of the JOURNAL dealing with the hazards attendant upon irradiation, hazards that involve the physician and the technician as much as they do the patients—apparently even more so This hazard is generally underestimated, but is largely preventable if proper and adequate precautions are employed X-ray apparatus and radium or its emanations are widely employed, but their dangers are not generally appreciated

MEDICAL SOCIETY OF THE STATE OF NEW YORK

1948 District Branch Meetings

Date	*Branch*	*Place of Meeting*	*Time*
September 14	Fifth	Watertown	Afternoon and evening (dinner)
September 16	Eighth	Batavia	Afternoon and evening (dinner)
September 23	Third	Parrott House, Schoharie	Morning and afternoon (luncheon)
September 24 and 25	Fourth	Saratoga Springs	Friday afternoon, Saturday morning (dinner Friday evening)
September 30	Seventh	Veterans' Hospital, Canandaigua	Morning and afternoon (luncheon)
October 6	Sixth	Binghamton	Afternoon and evening (dinner)
October 20	Second	Garden City Hotel, Garden City	Morning and afternoon (luncheon)
October 26	First	Newburgh	Afternoon and evening (dinner)

THE ADVANTAGES OF A SERVICE CONTRACT FOR LOW-INCOME SUBSCRIBERS

MILTON J GOODFRIEND, M.D., F A C S, New York City

(Member Board of Directors United Medical Service)

TOO often the cost is a deterring factor in seeking medical care, and unnecessary and often fatal delay results It is a curious paradox that, with the remarkable advances in the development of laboratory and other procedures for the early detection and diagnosis of disease and with the increased skills attained by the profession in providing remedial measures, the ability to pay the costs of such care has become increasingly difficult for a large segment of the population.

While charity wards and clinics are available and while the traditional sliding fee schedule of physicians which permits the adjustment of medical fees to the economic needs of the patient offers a partial solution, pride often prevents the acceptance of such methods Some of the needed medical care began to be provided through the organization of fraternal groups, consumer groups, industrial health organizations in part financed by the employer and other similar methods The type of care provided was, however not of the best and in most instances was incomplete and unsatisfactory Insurance against illness and its costs began to be developed In most instances, cash payments in specified amounts were paid, but the amounts involved usually fell far short of the sums needed to pay the costs of the care provided and for the low-income group was, therefore, not practical

Upon the passage of needed legislation and the organization of nonprofit plans for providing medical care, a tremendous forward step was made. The Associated Hospital Service proceeded to provide hospitalization benefits on a service basis At the onset, the service principle applied only to the room charge, including ordinary nursing care with a limit on the amounts available for laboratory, x ray, and other services However, in effect, these were sufficient to pay the actual costs involved in the great majority of admissions. With the growth of the movement and the development of proper safeguards against abuses in utilization, the service principle has been extended so that at present the subscriber is assured that under his contract the full cost of his hospitalization is covered

In addition to board and ordinary nursing care, there is available without additional cost

1 Full diagnostic facilities of the laboratories without regard to the number or variety of tests needed

2 Complete x ray diagnostic facilities

3 The use of operating room, cystoscopic room, electrocardiography, etc

4 Physical therapy equipment

5 All standard drugs including oxygen therapy Parenteral therapy and antibiotics are provided

Such a program must have a tremendous impact on provision of proper and adequate care No longer is the question of whether or not a test shall be done or a roentgenogram ordered weighed against its cost or postponed because the patient cannot pay In fact, so successful and satisfactory has this method been in providing the best possible care that many of the more progressive hospitals have placed all their admissions on a similar service basis under an all inclusive rate policy Very recently the Associated Hospital Service has extended similar services in all accommodations including private rooms

While the provision of these hospital benefits is of tremendous value for the low income group, they necessitated the utilization of physicians chosen by the patient to whom a fee had to be paid for operative or medical care As a result about 10 per cent of admissions were obliged to give up the benefits of semiprivate accommodations and accept ward treatment, and many others found themselves in difficult financial straits because of unusual or unexpected expenses attendant upon their illness. An attempt was made to provide an insurance policy for pay ward care at a lower premium level which would include complete medical coverage on a per diem basis This was to be experimental and required changes in the charter of the City and changes in the rules of most institutions There was considerable resistance on the part of both institutions and physicians, and very little progress was made

The need for providing some sort of insurance for these low income groups was great, and several nonprofit organizations have developed The low income group, however, cannot be considered as a homogenous group, nor are their needs similar The group is divided as follows

1 Totally indigent Complete service benefits can be extended to such individuals either as

Presented at the 142nd Annual Meeting of the Medical Society of the State of New York, New York City Teaching Day May 18, 1948.

medical charity through clinics, house calls, welfare departments, and wards of hospitals or by the payment of the premiums necessary to provide such care to an existing nonprofit insurance company by the State

2 Those who cannot meet full costs of even ordinary medical care and must be subsidized by either State or industry Such a program is being carried on experimentally with the payment for most part made by the employer The patient received full medical care in the house, office, or hospital

3 Those capable of meeting costs of ordinary illnesses but requiring some method of assurance against unpredictable cost of catastrophic illness

In this latter group the greatest success has so far been obtained A fee schedule was established which represented a reasonable return for the services rendered and which was accepted as full payment for low-income patients Arbitrarily, the income level for a family entitled to such benefits was set at $2,500 in the contract issued by United Medical Service, which has also provided an arbitration clause granting the right of appeal by the subscribers with incomes under $3,500 per annum against any excess charge by physician or surgeon whenever it is felt that such excess might create hardship to the family About 14,000 physicians in the metropolitan area have accepted this provision of the contract There has been a great public interest in this type of contract, as is evidenced by its rapid growth in the metropolitan area and elsewhere About 750,000 subscribers are presently enrolled in U M S , and a similar type contract through the State has resulted in a total enrollment of 1,025,000, an increase of over 22 per cent in the past year Such a contract now guarantees a free choice of hospital and completely free choice of physician or surgeon with the knowledge that the entire medical costs of a particular illness or accident are available Insurance fees are comparatively cheap and well within the means of this low-income group, and the method offers least disturbance to medicopublic relationship

Complete coverage on a service basis has been attempted on an experimental basis by the United Medical Service utilizing the fee schedule as a method of payment The costs of such a policy are considerable and, in most instances, not within the ability of the patient to pay In those policies issued by U M S the entire cost had been borne by the employers That there is no great demand for this type of coverage is evidenced by the fact that, although 25,000 contracts were authorized for the experiment, only 21,000 have been sold in the past three years

A similar type of policy is being issued by HIP with payment on a capitation basis The majority of contracts so far issued under this plan have been subsidized by the City of New York which pays 50 per cent of the costs, including hospitalization No facts are yet available as to the income distribution of subscribers to this plan, an important factor to consider If medical service rendered to the public is to be maintained at a high degree of competency, the return to the physician must be adequate and must take into consideration that, in acquiring the increased skills, greater specialization has become necessary and that the production years of the physician have been curtailed At the present time, incomes received by physicians seem satisfactory since they represent an "extra income" while maintaining a regular practice on the traditional basis It will be necessary to project the implications of this plan on a full-scale basis with full-time participation before a proper evaluation is possible This is particularly necessary because it is sold to the public with income levels representing almost 90 per cent of the total population Degree of utilization by subscribers is unknown

In the United Medical Service program of complete medical coverage, many danger signals are evident It is difficult to differentiate medical needs and medical demands The latter, if excessive, may destroy the plan either by making the rates too high for the family to afford or by making the return so small to the physician that the quality of care suffers Among the problems already presented are factors of prolonged medical care in chronic disease, recurrent conditions such as hay fever and other allergic manifestations, hormonal and glandular therapies, and neuroses of all types In an attempt to gain the necessary information, the United Medical Service provides full payment for all home and office visits and complete in-hospital coverage at present For all specialist examinations at home and in the office, including roentgenology, radiotherapy, and laboratory examination, a 50 per cent allowance is made Our experience is being closely studied with a full realization that the ultimate aim is the provision of full coverage to meet the needs of the low-income group It is our feeling that this can be obtained only by an objective study of the realities If it is found that a reduction in the fee schedule must be made and that by such action a greater number of the low-income groups can be attracted into the prepayment plan, a program of this sort will be launched A considerabl amounte of education of both the public and the physician will undoubtedly be necessary before a large-scale launching of such a program can be effected

There can be no doubt that only by the establishment of such a service contract can the real needs of the low-income families be met, and the medical profession, always ready and willing to render service to the needy, will, with proper safeguards, assume its rightful share in providing this

BENEFITS OFFERED BY THE VOLUNTARY NONPROFIT MEDICAL CARE PLANS OF NEW YORK STATE

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(*President, Western New York Plan Inc.*)

IN New York State we have six medical care plans that are approved by the medical profession the United Medical Service of the New York City area, Northeastern New York Medical Service of Albany, Medical and Surgical Care, Inc., of Utica, Central New York Medical Plan, Inc , of Syracuse, Genesee Valley Medical Care, Inc., of Rochester, and Western New York Medical Plan, Inc , of Buffalo One can readily see that the whole state is covered, although there is quite a variety in the types of benefits offered, and some are service contracts within a certain wage limit while others are indemnity contracts Since the first plans started operation about eight years ago when very little was known about this type of insurance, much had to be learned by trial and error Many of our ideas had to be modified as our statistics grew Today, we are pretty well able to tell what benefits a plan can safely provide at a premium that the average subscriber can afford to pay

At the present time the United Medical Service offers the three following types of contracts

1 *Surgical Plan* —This provides surgical benefits including treatments of fractures and dislocations and, in the family contract, obstetrics

2. *Surgery-Medical Plan* —This provides the same surgical benefits, plus medical care allowances when patient is hospitalized

3 *General Medical Plan* —This provides the surgical-medical benefits, and obstetrics, allowances for house and office calls at $2 00 for office and $3 00 for house visits, paid up to 20 visits in any one illness, and allowances for specialists' care Limited to group enrollment and employer must contribute. These are service contracts with wage limits of $1,800 for an individual and $2,500 for a family

The Northeastern New York Medical Service Inc , offers a medical and surgical contract which provides surgical benefits, anesthesia, emergency, first aid maternity care, medical services in the hospital limited to three weeks with a maximum of $150 initial hospital visit $5 00 and subsequent daily visits $3 00 An additional visit is $1.50 with extra allowance for long orthopedic cases extending to six weeks, with $1 75 per day for the fourth week, $1 50 per day fifth week, and $1 25 per day sixth week

This is a service contract with the following income limitations $2,000 for individual, $2,500 for applicant and spouse and $3,500 for applicant and members of family group

Medical and Surgical Care of Utica offers the following

1 *Surgical and Special Benefits* —This provides benefits for surgery and treatment of fractures and dislocations plus $10 for anesthesia in hospital, $10 for x ray, $5 00 for basal metabolism, $5 00 for electrocardiogram and $7 00 for special laboratory Dependents receive only one-half of the surgical fee

2 *Surgical and Special Benefits Plus Medical Expense Benefits* —The above benefits plus allowances of $2 00 for calls while in hospital for subscriber or dependent One call a day for a total of twenty-one calls during any one hospital stay and three calls within ten days after hospital discharge at $2 00 in physicians office or $3 00 elsewhere A total of 48 calls for a subscriber or dependent a year, but not over 150 calls for subscriber and his enrolled dependents during contract year

The Central New York Medical Plan of Syracuse offers

1 Surgical contract provides indemnities for surgical operation and procedures, treatment of fractures and dislocations, and maternity care under the family contract Ten dollars is allowed for anesthesia administered by a physician, $15 for diagnostic x ray in surgical cases

2 Medical-surgical contract which provides the indemnities of the surgical contract plus 25 house or office calls for the subscriber and 15 calls for each dependent per year The first two calls in each disability are not reimbursed

$ 2 00 for each call in hospital-medical
$25 00 for diagnostic x ray
$10 00 for therapeutic x ray
$ 5 00 for consultation in any one disability
$ 5 00 for specialist endoscopic examination
$ 5 00 for each electrocardiogram (maximum $15 00)
$10 00 for laboratory service (basal metabolism alone $5 00)
$10 00 for allergy tests

Presented at the 142nd Annual Meeting of the Medical Society of the State of New York New York City Teaching Day May 18, 1948.

$10 00 for physiotherapy
Rates Surgical $0 60 and $1 70, medical-surgical $1 50 and $3 00

The Genesee Valley Medical Care offers an indemnity surgical contract which provides benefits for surgical operations, the treatment of fractures and dislocations, and maternity care Ten dollars is allowed for anesthesia, and $15 maximum for x-ray when followed by surgery The rates are $0 60 and $1 70

The Western New York Medical Plan at present is offering only the surgical indemnity contract which provides benefits for surgical operations, treatment of fractures and dislocations, and maternity benefits, with allowances of $10 for anesthesia and $15 for diagnostic surgical x-ray The rates are $0 60 and $1 70

Thus it is seen that we have plans with a wide variety of benefits in New York State, and some are service contracts within certain wage limits while others are indemnity contracts with no wage limits

The limitations and exclusions and conditions not covered do not vary greatly in any of the contracts These are mainly as follows

1 Conditions existing at or before membership
2 Occupational disease or injury
3 Conditions resulting from use of drugs or alcohol
4 Services to anyone who had prior to membership cancer, diabetes, osteomyelitis, tuberculosis, chronic nephritis, or coronary thrombosis
5 Hospital charges, drugs or appliances, nursing fees, dentistry, blood donor service, preventive vaccinations or inoculations against disease, and eye examinations
6 Congenital lesions

Most plans have a waiting period of three to ten months for tonsil and adenoids and hernia operations and a ten-month period for maternity The waiting periods and pre-existing exclusions are usually waived where 75 per cent of large groups are enrolled

The benefits under the voluntary nonprofit plans average at least a third more than the contracts offered by the commercial companies

The question of the possibility and the advisability of including house and office calls in our plans opens up a big field for discussion We now have enough statistics on exposure and utilization of surgical and maternity care to know what services can be provided for a reasonable premium with a safe margin to provide the necessary reserves, and the same can be said about in-hospital medical care However, up to the present time, there is no way to predict the demand for house and office calls, and there is no way to check the many abuses that develop when they are included in a plan Many ways have been and are being tried Limiting the number of calls per year, providing a coinsurance clause having subscriber pay half of the first three or four calls, and no payment for the first two or three calls are some of the so-called controls

All of these require considerable bookkeeping, both by the plan and by the member physician, and often lead to much confusion, especially where the patient leaves one physician to go to another I would advise careful study before any plan ventures forth on this so far uncertain liability

I believe that the time has come when all the plans of the State should get together and develop a single plan, an in-hospital medical-surgical contract to be sold by all the plans, having the same benefits and premium rates throughout the State This could be sold in addition to the present contracts, and I believe would appeal to employers who have branch offices or factories throughout the State

The plans have done a wonderful job in the few years of their existence, and are still in their infancy with a great future ahead How far they go will depend greatly on the continued and increasing cooperation of the medical profession Each physician should be our best public relations man and our best salesman

As the plans grow and experience is gained and as the reserves mount, we must always be planning ahead with the idea of increasing the benefits to the subscribers as fast as possible These changes must be approved not only by your local plans but also by the State Department of Insurance whose duty it is to see that the subscriber is properly protected at all times I would like at this time to compliment the Department on its interest and fine cooperation with all the plans

We have a big job to do How well it is done depends on each and every one of us

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COSTS OF FEDERAL AND STATE GOVERNMENTS

A study of this country's budget request made by the President for 1949 of $39,669,000,000 has been released by Senator Styles Bridges of New Hampshire, which shows, state by state, the pro rata cost of the President's budget compared with the cost of operating each state's own government. Of interest are the figures for New York. The cost of the Federal Government in our State is $8,457,000,000, that of the State itself, $649,000,000 In other words, Federal exceeds State cost thirteen times

DIFFERENTIAL DIAGNOSIS OF PULMONARY LESIONS

STANLEY B CLARK, M D , Dunkirk, New York

(From the Department of Roentgenology Brooks Memorial Hospital)

LESIONS of the chest, next perhaps to those of the gastrointestinal tract, offer the greatest challenge to the roentgenologist's diagnostic skill In view of this I have compiled certain roentgenologic criteria, based primarily on the essential underlying pathology, for the differential diagnosis of the more common pulmonary lesions.[1] If the type of lesion is recognized radiographically and the underlying pathologic process is appreciated, it is possible in most instances to make a relatively accurate differential diagnosis when the above are correlated with the clinical data. In most instances the basic gross pathology can be accurately correlated with the radiographic findings. However, it is first essential that the normal and the normal variations commonly seen in chest radiographs be differentiated from the abnormal or pathologic processes when present

It is the desire of the author that this paper serve as a guide for the physician in general practice who most often first encounters the lesions presented and who first has the occasion to correlate clinical, pathologic, and roentgenologic data in attempting to arrive at a correct differential diagnosis The pathologic and roentgenologic findings are presented with this in mind and the lesions are grouped according to the basic underlying pathologic process.

No attempt has been made to discuss etiology, symptomatology, or treatment as these are outside the scope of this presentation. Likewise, pulmonary manifestations of rarer diseases, such as Loeffler's eosinophilia, erythema nodosum, periarteritis nodosa, and others have been purposely omitted, as have primary mediastinal lesions with the exception of bronchogenic carcinoma.

Destruction of Pulmonary Tissue

Lung Abscess and Gangrene of the Lung —These processes usually involve the lower lobes probably because of the easy accessibility of infection through and poor drainage from the lower lobe bronchi. The right lower bronchus is more vertical in position which may account for a slight prevalence in the involvement of the right lower lobe over the left lower lobe. The abscess is always subpleural in location leading in most cases to a localized pleurisy with adhesions. At first it is a solid mass of inflammatory tissue which later breaks down to form a necrotic cavity the contents of which are expectorated through the bronchi

Radiographically a rounded cavity, often with a fluid level, can be distinguished surrounded by a localized area of dense pneumonitis. In the early stage, before liquefaction occurs, it appears no different from any other type of localized pneumonitis The fact that the abscess extends to the pleura is not always apparent, even on films taken at right angle projections It is well to remember that the cavity will disappear radiographically if it becomes filled with exudate so as to displace the air This occurs when the bronchus leading to the abscess becomes obstructed and is concomitant with a cessation of the expectoration. It should not be construed as indicating healing of the process since the only criterion for cure is complete disappearance of the infiltration and the cavity

If spontaneous recovery does not occur or if external drainage is not carried out, sooner or later the process spreads to involve other portions of the lung The mode of spread is either by direct extension or through the bronchi. The opposite lung may become involved by way of the tracheobronchial tree.

Bronchiectasis —This condition usually starts as a bronchial dilatation and progresses to actual excavation of the pulmonary parenchyma to form an abscess cavity The dilated bronchi are of two forms, cylindrical and saccular Either or both may occur however the former is more common In most instances the process is bilateral and tends to involve the lower rather than the upper lobes Because of the initial bronchial dilation, purulent material stagnates in the involved bronchi, further adding to the weakening of the bronchial walls According to Boyd the most significant lesion is the destruction of the bronchial musculature and elastic tissue with resultant weakening of the wall and subsequent dilatation [2]

Radiographically there may be no indication of a pathologic process or there may be areas of infiltration, interstitial in distribution, at one or both bases with suspicious areas of "cavity" formation interspersed The "cavities" are actually dilated bronchi The infiltrates, as seen on the plain chest film, are due to progression of the inflammatory process outside of the bronchi and therefore, tend to follow the course of the bronchi

are voluminous and pale, the alveoli are distended, and their walls are atrophic with an increase in fibrous tissue Large blebs or bullae project on the surface as a result of breakdown of the alveolar septa secondary to the increased intra-alveolar pressure Atrophic emphysema is seen in old age and in wasting diseases and is not a true emphysema There is atrophy and disappearance of the walls of the alveoli so that large spaces are formed The alveoli per se are not distended

Radiographically, the two forms of emphysema are not readily distinguishable In the atrophic form, there is increased radiolucency, the bronchovascular markings standing out in sharp contrast to the hyperaerated parenchyma In the hypertrophic form, there is, in most cases, an underlying chronic bronchial infection with thickening and exaggeration of the peribronchial and interstitial connective tissue The lungs show generalized hyperaeration with a fine interlacing network of strandlike shadows throughout as a result of the interstitial fibrosis

There is also increase in the size of the chest, with widening of the intercostal spaces, flaring of the ribs, and flattening and depression of the diaphragm, secondary to the increase in lung volume The bronchial infection usually extends to the pleura by way of the peribronchial lymphatics This often results in pleural adhesions which manifest themselves as fine lines along the fissures, tentlike shadows at the borders of the diaphragm and mediastinum, and by partial obliteration of the costophrenic angles Under the fluoroscope, diaphragmatic excursions are often seen to be limited or absent during quiet respiration

Changes in the pulmonary circulation resulting from emphysema are well known and will not be discussed

Lesions Primarily Interstitial in Location

Primary Atypical Pneumonia [5]—A pathologic picture that is primarily one of an interstitial pneumonia with accompanying destructive or degenerative changes in the alveolar and bronchial epithelium is presented There is hemorrhagic thickening and edema of the interalveolar septa and infiltration of the interstitial tissues with lymphocytes, monocytic cells, and neutrophilic leukocytes The terminal bronchial lumens are filled by a fibrinoplastic exudate and often show diffuse necrosis

Radiographically, the infiltrations show great variation as regards extent, character, and duration There are certain general statements according to Jamison regarding atypical pneumonic infiltration which he believes are justified and which merit repeating [5] For instance, pneumonias of this type are rarely lobar in character or distribution, the majority are localized to the middle or lower lung fields, and they are slow in resolution, usually passing through an intermediate stage of peribronchial infiltration and occasionally shifting from one part of the lung to another

Infiltrations of primary atypical pneumonia fall into two main classes according to Jamison, one, a peribronchial type, and the other, a more or less confluent type of pneumonic consolidation The peribronchial type of infiltrate appears as fuzzy, roughly linear areas radiating from the hilum or as patchy or mottled areas, usually closely associated with the basilar bronchovascular markings Frank consolidations of the confluent type are found in the middle or lower lung fields The infiltrations vary from a soft homogeneous haze to a density approaching that of lobar pneumonia True lobar distribution is seen only rarely, as the disease has no respect for interlobar boundaries

Another interesting feature brought out by Jamison is the occasional presence of central pneumatoceles which develop within zones of consolidation producing cavity-like appearances Such pneumatoceles disappear as the surrounding pneumonia resolves

Boeck's Sarcoid—These lesions are discrete tubercles composed of epithelioid cells and giant cells These tubercles differ from those of tuberculosis in that they do not become confluent, do not undergo caseation, and do not calcify Healing occurs by fibrosis, resulting in the production of a connective tissue scar

Radiographically, the enlarged hilar and mediastinal nodes are outstanding They are usually bilateral, smooth and lobulated in outline, resembling malignant lymphoma Following the nodal enlargement, there can be seen coarse infiltrates radiating into the adjacent lung fields from the hila Finally, coarse mottling appears in both lungs Regression of the lesions is in reverse order, is very slow, and leaves little, if any, scar

The marked pulmonary involvement found by x-ray, in contrast to the paucity of clinical signs and symptoms, is a striking feature of the disease It is important and often difficult to differentiate the pulmonary lesions of sarcoidosis from those of tuberculosis and silicosis Extrapulmonary manifestations of sarcoidosis are sometimes seen and, when present, may aid in establishing the diagnosis Bone lesions are infrequent but characteristic when present Splenic enlargement is sometimes seen radiographically where it is not palpable clinically Gastrointestinal sarcoidosis may simulate regional enteritis Again, discussion of these and other extra-

pulmonary manifestations is outside the scope of this paper, and they are mentioned only as an incentive for further investigation when the problem of differential diagnosis of Boeck's sarcoid arises.

Replacement of Normal Pulmonary Tissue by a Pathologic Process

Metastatic Tumor.—This may reach the lungs by way of the blood stream or the lymphatics. Hematogenous spread to the lungs is more often seen in primary lesions of the breast, thyroid, kidney, and prostate, where the venous return is by way of the vena cava directly to the right heart. Primary lesions of the gastrointestinal tract, particularly the stomach, and also the pancreas, gallbladder, and ovary, on the other hand, more often metastasize to the lungs by the lymphatic route. Culver reported four interesting cases of miliary carcinosis of the lungs.[6] In two, the gallbladder was the site of the primary lesion, while the others were primary in the stomach (radiographic diagnosis) and pancreas. While hematogenous spread to the lungs from primary cancer of the gastrointestinal tract and associated organs is not common it does occur and should be considered in the differential diagnosis.

Metastatic neoplasms of the lungs, even though they be of considerable size, usually give rise to no abnormal physical signs detectable in the clinical examination of the chest.

Radiographically, the lesions in hematogenous carcinosis vary in size, are usually multiple, and roughly rounded with ill-defined borders. They are more numerous in the lower than in the upper portion of the chest, and several may coalesce to form larger areas of density. Both lungs are often involved. The pleura may become secondarily involved, producing an effusion. In metastatic sarcoma, the densities are larger and rounded with discrete borders and do not tend to coalesce.

In lymphatic extension of metastatic tumor, the densities are interstitial in distribution radiating from the hilum. Underneath this linear network of increased density can be seen less distinct, fine, miliary nodules which according to Mueller and Sniffen correspond to the point of intersection of the linear streaks or represent fine lymph vessels which are hit edge on by the roentgen rays.[7] The densities are due to dilatation of the peribronchial and perivascular lymphatics with cancer cells.

Primary Lung Tumors.—These are bronchogenic in origin, and hilar bronchial, or peripheral in location depending on the site of origin in the bronchial tree. Histologically they may be divided into three types: the cylindrical cell, the small cell, and epidermoid or squamous cell carcinoma. All three types may be found in the same lung and there is no sharp line of division between the different groups.

A primary carcinoma spreads from the original site through the lung to the lymph nodes and to distant organs.

Spread through the lungs may occur in two ways. The cells may extend along the terminal bronchioles and become implanted in the alveolar epithelium (bronchogenic spread), or they may invade the peribronchial lymphatics (lymphatic spread). The mediastinal lymph nodes are always involved and may be so increased in size as to lead to an erroneous diagnosis of primary mediastinal lymphoma. Other neighboring glands, as well as distant organs, may be invaded.

Radiographically, an atelectatic lobe(s) may be the only finding as the density of the collapsed portion of the lung may obscure the shadow of the tumor. In other instances the actual tumor can be visualized, often in the region of the hilum. Pleural fluid may obscure both the primary tumor and an underlying atelectasis. If the mediastinal structures are not appreciably shifted in the presence of a considerable collection of pleural fluid the possibility of an associated atelectasis should always be considered. The tumor itself when visible radiographically, appears as an ill-defined mass of variable size, usually near the hilum, the borders of which infiltrate the surrounding pulmonary parenchyma.

It is important and often difficult to differentiate lung tumor from tuberculosis and primary atypical pneumonia. Tuberculosis usually involves one or both upper lobes. The infiltrations are feathery in appearance and patchy in distribution, often showing cavity formation. The clinical and laboratory findings are often times essential in arriving at the correct diagnosis. Atypical pneumonia is essentially a peribronchial infiltrative process with an associated alveolar element at times. The entire process may heal slowly or may clear more rapidly in one area of the lung, only to reappear in another. Careful correlation of the clinical, roentgenologic, and laboratory findings must be made in certain instances before the correct diagnosis can be determined.

In primary lung tumor, there is commonly an associated secondary inflammatory process which under proper treatment will subside, giving a false impression, both clinically and radiographically, that the patient is on the road to recovery. Bronchoscopy will often clinch the diagnosis and should not be deferred despite a contrary clinical course if repeated radiographic examinations suggest the presence of a primary lung tumor.

Procrastination may mean the difference between an operable and an inoperable tumor

Alteration in Pleural Density

Pleural Thickening—This end result of pleural infection is caused by the organization of inflammatory exudate covering both the visceral and parietal pleura and eventually producing an extensive fibrosis The thickness varies according to the amount of exudate laid down at the time of the active infection

Normally, the pleura is not visible in the chest radiograph Lung fissures, obliterated by pleural adhesions, are visible only if they are situated in a plane parallel with the direction of the rays The importance of recognizing the normal positions of the lung fissures cannot be stressed too much, since slight variations in their positions may be the only clue leading to the correct radiographic diagnosis of a pulmonary pathologic process

Localized adhesions are best seen in films taken in deep inspiration as the tension on the parietal pleura causes them to be drawn inward with their base on the pleural surface This type of adhesion is commonly seen over the diaphragm and the borders of the mediastinum More generalized pleural adhesions involve the region of the costophrenic angles which may become obliterated There may also be seen a more or less sharply defined, narrow, dense rim along the chest wall extending from the apex to an obliterated costophrenic angle

Dense adhesions along the mediastinal aspect of the lungs cause a sharp straightening of the mediastinal and cardiac contours, partially obliterating the normal configurations of the aorta, pulmonary artery, and the heart Unusually dense adhesions may cast a faint, even shadow over the chest, obscuring, in part the underlying lung markings Retraction of intercostal spaces and pulling over of the heart and mediastinum secondary to an old, contracting, pleuritic process must be differentiated from similar changes resulting from an atelectasis

Tumors—Pleural tumors are either primary or secondary, the latter being more common Localized primary tumors arise from the subpleural tissues of either the visceral or parietal pleura Tumors of the parietal pleura present a great variety of forms as they may originate from any of the underlying structures They are usually malignant, invading the chest wall and metastasizing to the mediastinum and distant organs Visceral pleura tumors, on the other hand, are usually benign

Mesotheliomas are diffuse tumors arising from the serosal cells proper They produce thickening of the pleura which may extend over a considerable area Either the parietal or visceral pleura or both is involved

Secondary tumors of the pleura are, for the most part, carcinomas and take the form of multiple, small nodules scattered over the surface of the pleura

Radiographically, diffuse primary pleural neoplasms and massive pleural effusion have a similar appearance One characteristic of diffuse pleural tumor, if present, may serve to differentiate it radiographically from effusion, that is, invasion of the chest wall with the formation of localized areas of nodulation in the soft tissues It should be borne in mind that pleural effusion and tumor frequently coexist, often necessitating aspiration as a diagnostic procedure

Localized pleural neoplasms are usually well-demarcated, rounded densities which may or may not show lobulated borders Radiographs taken in various projections following thoracentesis and air injection cannot be overemphasized as a diagnostic procedure and are necessary for accurate localization in most instances

Metastases to the pleura are commonly evidenced by the presence of a pleural effusion In other instances, the actual tumor mass or masses may be visualized along the periphery of the pulmonary fields

10 West Sixth Street

References

1 Golden, Ross Diagnostic Roentgenology, New York, Thomas Nelson and Sons, 1941
2 Boyd, William A Textbook of Pathology 4th ed Philadelphia, Lea Febiger 1943
3 *Idem.* Pathology of Internal Diseases 4th ed , Philadelphia Lea Febiger 1944.
4. Krause G R. Radiology 45 107 (Aug) 1945
5 Jamison, H. W Radiology 45 15 (July) 1945
6 Culver Gordon J Am. J Roentgenol. 54 474 (Nov) 1945
7 Mueller H P and Sniffen, R. C Am. J Roentgenol 53 109 (Feb) 1945

Physicians who are bored with the plethora of papers on tuberculosis should remember that preaching religion is still necessary after hundreds of years —*Exchange*

Bronchiectasis may not cause copious sputum, there may be no streaking, cough may be absent, fingers need not be clubbed, and rales may be absent —*Exchange*

SUCCESS WITH ORAL MERCURIAL DIURETIC.

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PATIENTS with congestive heart failure may continue to carry on for many years They require constant medical care, and, of course, their treatment may have to be varied with changing conditions. In the treatment of these cases, mercurial diuretics have an important if not indispensable place, the parenteral mode of administration being almost universally favored However in our experience with long term treatment of heart failure, potential or severe, we have frequently been able to obtain better results with the oral mercurial diuretics than with the other forms of mercurial diuretics

To demonstrate this point, we are reporting the following illustrative case

Case Report

The patient was admitted to the hospital for the third time on July 31 1946 She was a 53-year-old white housewife who complained of dyspnea at rest orthopnea, and mild weakness. All three of these disabilities had been progressing for two weeks and were now incapacitating The patient was known to have rheumatic heart disease (inactive) and had been attending the outpatient cardiac clinic intermittently since December 1944

First Hospital Admission.—Her first admission was on November 25 1944 with complaints of enlarged abdomen, swelling of legs, and dyspnea of three weeks' duration. However the dyspnea had actually been present and slowly progressive for three and a half years. The following significant physical findings had been recorded The patient appeared moderately and acutely ill and dyspneic. There was moderate pulmonary congestion and peripheral edema. The heart was enlarged systolic and diastolic murmurs were audible at the apex. Auricular fibrillation was noted with a pulse rate of 80 and a ventricular rate of 128 The blood pressure was 110 systolic and 80 diastolic. The liver was enlarged to three fingers below the right costal margin.

The patient received bed rest, restricted salt and water intake, digitalis, and a total of three doses of mercupurin (2 cc. each) parenterally Her admission weight was 248 pounds, and when discharged on the thirty-first hospital day, she weighed 184 pounds. She was referred to the cardiac clinic for further guidance and given a maintenance dose of digitalis, 0 1 Gm. daily With the latter and an occasional dose of mercupurin (2 cc) parenterally the patient managed fairly well but slowly decompensated again and was admitted for the second time on February 22, 1946

Second Hospital Admission.—At this time, the patient stated that dyspnea, ankle swelling, and a nonproductive cough had all been present for several weeks. Physical examination on admission revealed the patient to be moderately ill In addition to the findings noted at the time of the first admission there were a diastolic blowing aortic murmur a 'fat apron covering the lower abdomen, and massive edema of thighs and buttocks. She weighed 213½ pounds on the eleventh hospital day

The patient received the same therapy as on the first occasion of hospitalization except that she received a total of 15 doses of mercupurin (2 cc. each) parenterally and two courses of quinidine, each one consisting of eight doses (0 4 Gm. each dose) Aparacentesis abdominal yielded 5 500 cc. of fluid.

The patient was discharged on the seventy first hospital day She weighed 177½ pounds and felt capable of carrying out her duties at home Despite a maintenance dose of digitoxin 0.2 mg. daily, mercupurin 2 cc. weekly and ammonium chloride 2.0 Gm daily she slowly began to decompensate again For two weeks prior to the third admission, she had suffered progressively severe dyspnea at rest, marked orthopnea, and weakness. On July 31 1946 these symptoms had become so severe that she again required hospital care.

Third Admission.—Review of the patient's history at the time of the third admission revealed that the actual onset of symptoms was seven years previously in 1939 (age 46) These early symptoms were dyspnea on exertion and ankle swelling. Progression of symptoms was slow until the first episode of cardiac failure but had accelerated since then Neither the family history nor the patient's past history was contributory

On the third admission, the patient appeared *small but well developed and well nourished* She was acutely ill with intense respiratory embarrassment, literally, sitting up in bed and gasping for breath.' Her temperature was 100 6 F., the pulse 96, respiration 40 and blood pressure 140/80 The skin was dry and warm. Pendulous folds of edematous skin were evident about the lower abdomen, buttocks, and thighs. No lymph nodes were palpable. The retinal vessels were tortuous and showed moderated arteriovenous compression but no hypertension was noted while she was under our observation. The ears nose, and throat were normal. The teeth were poor The neck was relaxed, and the great vessels were distended, but there was no thyroid enlargement or displacement of trachea. Examination of the lungs revealed numerous, medium moist rales at both bases, more evident posteriorly When the heart was examined, a point of maximal impulse could not be palpated. The sounds were of fair quality at apex and base. There were short harsh systolic and diastolic murmurs at the apex but no palpable thrill. The aortic

murmur reported at the time of the second admission was not audible The pulse rate and the ventricular rate were both 96, the rhythm was totally irregular The abdomen was obese, tympanitic, and very large, a fluid wave was elicited The lower extremities and buttocks were massively enlarged The soft tissues were heaped up into large corrugations (folds) from the ankles to the iliac crests Some pitting edema was present, but much of this enlargement was due to a firm, diffuse, brawny type of edema. The admission diagnosis according to the "criteria" was as follows (*a*) rheumatic heart disease (inactive), (*b*) enlarged heart, myocardial fibrosis, and mitral stenosis, and insufficiency, (*c*) auricular fibrillation, mitral stenosis and insufficiency, decompensated

Course in the Hospital—Shortly after admission the usual therapy, bed rest, sedation, restricted salt and water intake, and ammonium chloride, 2 0 Gm. thrice daily, was instituted The maintenance dose of 0 2 mg digitoxin daily was continued. With the above therapy and oxygen by nasal catheter the patient did not improve

The decision was made, therefore, to give this patient intensive mercurial diuretic therapy, she was given mercuhydrin (2 cc intramuscularly) daily, commencing on the second hospital day At that time she weighed 213 pounds On the fourth hospital day, and after the patient had already lost 25 pounds in weight, a paracentesis abdominis yielded 10,000 cc of pale amber fluid The specific gravity was 1 016, culture and smear were negative, and microscopic study of a "cell block" revealed no unusual cells

Fluoroscopic examination of the heart on the tenth hospital day revealed enlargement of all the heart chambers, particularly evident was the enlargement of the right and left auricles and the prominence of the pulmonary conus

On the eleventh hospital day, and after receiving 10 doses of mercuhydrin (2 cc each), the patient weighed 159 pounds as compared with the earliest recorded weight of 213 pounds on the third hospital day She had lost more than 54 pounds By the thirteenth hospital day, the patient was ambulatory and fairly comfortable, and by the twenty-first hospital day, her weight was stabilized near 160 pounds She had received 19 doses of mercuhydrin parenterally

Since she seemed to have reached a "dry weight," it appeared desirable to decrease the frequency of therapy A trial dosage of 2 cc of mercuhydrin on alternate days was not successful After only six days' trial therapy, the patient had gained four pounds and was again rather dyspneic and uncomfortable As was to be expected, she also complained of pain at the site of injection, 22 of which had been administered.

Since the patient seemed to require 2 cc. of mercuhydrin each day, since pain was a factor in producing discomfort, and since this therapy necessitated continuous daily attendance of a physician, it appeared desirable to try administration of an oral preparation. Auricular fibrillation was present with little or no pulse deficit and with ventricular rate ranging from 60 to 80 per minute

Therapy was then initiated with an oral preparation of mercupurin on the twenty-ninth hospital day At first, when the patient was receiving 0 2 Gm. three times daily, she gained nine pounds in eight days Over a period of two days, the dose was then increased to 0 4 Gm four times a day

Nausea, emesis, and dizziness ensued at first when the total dose of 1 6 Gm. was given in two portions By dividing the daily doses into four portions, these annoying symptoms were eliminated, the patient did not seem to mind micturition "all day and all night" On one occasion, 2 4 Gm. was administered in four divided doses, but nausea and emesis were produced The patient was, therefore, maintained on 1 6 Gm., and in nine days she had lost nine pounds Remarkably enough, her weight continued to decrease and dropped below the level previously considered her "dry weight" while receiving the mercuhydrin intramuscularly

About this time, the forty-eighth hospital day, the patient complained of enlarged and tender cervical lymph nodes and "sore gums" Dental examination revealed carious teeth, calcareous deposit, and gingivitis Routine dental prophylaxis and a hydrogen peroxide mouth wash relieved the gingivitis readily The ammonium chloride was discontinued on the forty-ninth day It is not possible to state definitely whether or not this represented mercurial gingivitis which is more common in people with poor oral hygiene

On the fifty-second hospital day, the patient suddenly developed pain, swelling, and redness in the left lateral epicondylar region The blood uric acid level and x-ray examination of the left elbow were both normal Salicylates offered relief and, in two days, the episode was at an end Whether or not this represented an acute gouty arthropathy secondary to critical diuresis remains speculative

Because the patient's heart was still fibrillating with a ventricular rate ranging from 60 to 100, it appeared desirable to increase the dose of digitoxin to 0 3 mg daily As is evident on the graphic chart, this produced a further and appreciable loss of weight

On the sixty-first hospital day, the patient developed a bilateral catarrhal conjunctivitis which disappeared after use of a penicillin collyrium for twenty-four hours On the sixty-third hospital day the patient had a tooth extracted without complication, penicillin was administered intramuscularly for prophylaxis, prior to and subsequent, to the extraction

For a period of sixteen days, the patient received 0 3 mg digitoxin daily in addition to the intensive oral mercupurin therapy At the end of this period she felt very comfortable with little dyspnea, except on exertion, and was helping to do things about the ward There was no pulmonary congestion or enlarged liver, minimal peripheral edema persisted An ECG at this time revealed a sinus rhythm with a rate of 56, and the patient had lost an additional significant amount of weight, bringing

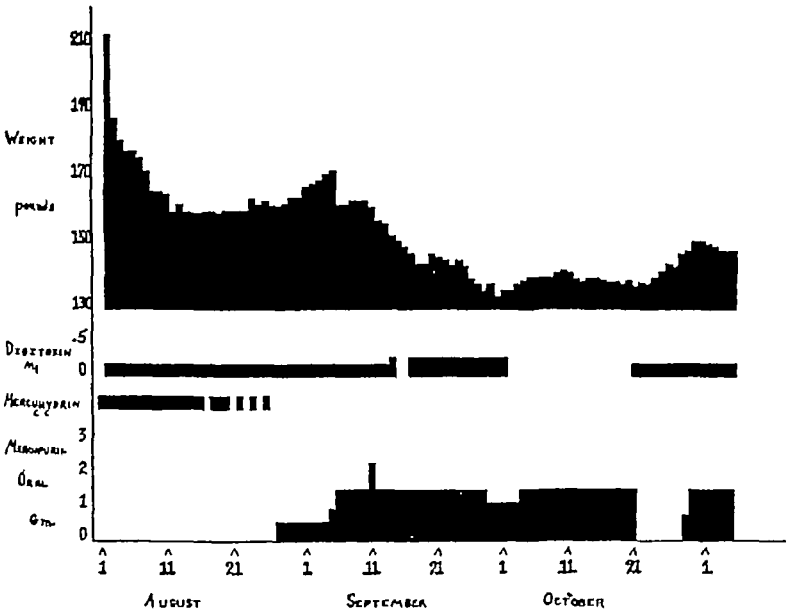


FIG 1

the total weight loss to the neighborhood of 80 pounds in sixty-one days.

Subsequent to this, the patient received no digitoxin but only oral mercupurin, 1 6 Gm. daily for seventeen days. At first, she gained a few pounds, but this leveled off again at approximately the same weight. Clinically she retained her improvement.

On the eighty third hospital day, the patient received 1.2 mg. digitoxin (the last previous dose was nineteen days before) and for the following seven days she received 0.2 mg. digitoxin daily but no mercupurin In this short space of seven days she again became dyspneic orthopneic, weak, and uncomfortable. She had gained ten pounds (Fig 1)

The patient was then given 1 6 Gm mercupurin and 0.2 mg. digitoxin daily until she left the hospital, weighing 145 pounds on the ninety-sixth day

Conclusions

1 Oral mercurial diuretics may be effective in the management of cardiac failure and sometimes may even be more effective than digitalis bodies

2. Oral mercurial diuretics may provide a technic for management of cardiac failure which eliminates the discomfort of repeated injections required with parenteral medication.

3 Oral mercurial diuretics may provide a treatment which eliminates repeated drastic diuresis and freedom from sudden withdrawal of chlorides

4 Causes for failure of oral mercurial diuretic therapy include (*a*) inadequate dosage, (*b*) short period of trial, and (*c*) concentration of doses (causing gastric irritation) rather than division of doses

5 An additional cause of failure may be side effects from other drugs such as digitalis bodies Such effects when attributed to oral mercurial diuretics operate to prevent adequate trial.

6 Studies in the management of acute cardiac insufficiency with parenteral mercurial diuretics may lead to the conclusion that the digitalis bodies may be dispensed with on certain occasions.

7 Oral mercurial diuretics in maintenance dose may be one answer to the question of recurrent cardiac decompensation in patients well digitalized but persistently in mild failure

TOLERANCE STUDIES OF THE ANTIHISTAMINE DRUG THEPHORIN

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AN ANTIHISTAMINE action has been demonstrated in animals following the administration of Thephorin, a brand of phenindamine (2-methyl-9-phenyl-2,3,4,9-tetrahydro-1-pyridindene hydrogen tartrate) [1-3] As a preliminary step in the use of this material for the control of allergic manifestations in which histamine releases play a part, the general effects of the drug have been observed subjectively and objectively in a representative group of individuals not known to have any allergic disease or clinically recognizable disturbance of the autonomic nervous system

Materials and Methods

Subjects and Their Management —All subjects were ambulatory patients attending a general medical clinic They were selected at random except that all cases with a known allergy or recognizable disease of the autonomic nervous system were summarily excluded During some representative period of the study, usually for one week, each subject received a placebo, identical in shape and appearance with the test material On this basis, a group of subjects was eliminated whose observations were obviously unreliable As the study proceeded, it became clear that in order to avoid confusion, all subjects who, prior to the use of the drug, suffered from dizziness, drowsiness, insomnia, dryness of the mouth, and any of a variety of gastrointestinal complaints should also be barred from the experiment

The remaining subjects were further screened for their ability to cooperate and to make accurate, consistent statements regarding their condition The majority of the patients came to the clinic because of a mild benign hypertension or a low-grade hypertrophic arthritis Effort was made to conceal the fact that we were interested in the "side" effects of the drug by emphasizing the point that the medication was specific for the particular illness of the patient, or nonspecifically directed to "build them up" as would a tonic or vitamin In follow-up visits, leading questions were not propounded, but, after stating how he felt in general, the patient was always asked if any new symptoms had appeared The nature and severity of these were carefully recorded

The patients ranged between seventeen and seventy-nine years of age with an over-all average of thirty-nine years, 50 were men and 50 women

Posology —In all instances, the daily dose of Thephorin* was divided into three equal parts and administered orally Each tablet contained 25 mg of material, and total daily doses ranged from 75 to 600 mg The usual therapeutic doses range from 25 to 150 mg daily, so that our trials are designed to uncover not only possible side effects in usual dosages, but also to determine the trend of side effects, if any, of the largest doses Moreover, these high amounts make possible a weight-for-weight comparison with other well-known antihistamine agents

Interval and Total Period of Observation Observations were made at weekly intervals No subject was observed for less than two weeks, and the majority were observed for four weeks Usually a placebo was administered during the first week, and, if the patient's responses were consistent and reliable, increasing doses of the drug according to the gradually ascending scale noted in Table 1 were employed for one week each However, this order was not always followed, as some patients were utilized at a single dosage level, and others received the placebo after, rather than before, one or more weeks of medication Three subjects were observed at each of the seven dosage levels, while eight subjects were followed for two weeks only

Laboratory Procedures —Urinalyses and complete blood counts were performed on all subjects prior to the initiation of therapy, no patient was included in whom any abnormality was present In approximately 50 per cent of the patients these examinations were repeated at least once during or at the end of the period of treatment with Thephorin Before and at periodic intervals during the treatment of ten patients, the nonprotein nitrogen of the blood was determined and electrocardiographic tracings made In addition, a number of other laboratory tests were performed as indicated by the clinical condition of the individual subject

* Through the courtesy of Drs. Elmer Sevringhaus and W T Strauss generous supplies of Thephorin were made available by Hoffmann-LaRoche Inc

TABLE I.—UNTOWARD REACTIONS FOLLOWING THE ORAL ADMINISTRATION OF THEPHORIN AT VARIOUS LEVELS OF DOSAGE

Total Number of Subjects	Daily Dose, Mg.	Number of Patients with Reactions—Total	Number of Patients with Reactions—Per Cent	Nature and Incidence of Toxic Manifestations—Central Nervous System—Insomnia	Drowsiness	Dizziness	Weakness or Numbness	Jumpiness, Jitteriness, Nervousness	Skin and Mucous Membrane—Dryness of Mouth, Sweating	Burning, Tearing of Eyes	Gastrointestinal Tract—Constipation	Cramps	Anorexia	Nausea	Circulatory System—Palpitation	Flushing	*
13	75	2	15 4	2						1	1		1				0
17	150	4	24 1	2					2	1	1			1		1	0
16	225	4	25 0	4		2			2	2	1						0
16	300	8	50 0	4	2	2	2	2	3		1						1
14	375	8	57 1	4	1	2		2	5	1	2				1		1
12	450	7	58 3	3		2	1	2	5		3	2					2
12	600	9	75 0	2		1		2	5		2	2			1		2
100		42	42 0	21	3	9	3	8	22	5	11	4	1	1	2	1	5

* Represents the number of subjects who voluntarily stopped the drug because of the severity of side effects.

Results

The toxic side reactions following the oral administration of Thephorin are summarized in Table 1. They may be conveniently separated into four categories, namely, those symptoms indicating disturbance in (*a*) the central nervous system, (*b*) the skin and mucous membranes, (*c*) the gastrointestinal tract, and (*d*) the cardiovascular system.

The common neurologic manifestations somewhat in the order of their frequency, included insomnia, dizziness, weakness, numbness, coldness, jumpiness, shakiness, nervousness with increased irritability, and drowsiness (Table 1). The toxic effects upon the skin and mucous membranes were excessive perspiration, dryness of the mouth oftentimes associated with increased thirst and at other times with bitterness in the mouth, and burning or tearing of the eyes occasionally associated with blurring of vision. The most common gastrointestinal symptoms were constipation, abdominal cramps, anorexia, and nausea. Palpitation and flushing constituted the only circulatory disturbances recorded and were observed infrequently.

The most commonly noted toxic symptom was insomnia. Next in frequency, and often first in severity, was dryness of the mouth, sometimes accompanied by an increased thirst. Burning and tearing of the eyes, not unlike that often associated with the ingestion of iodine, and constipation represented the remaining symptoms which were prone to occur at any level of dosage. When 300 mg. or more of the drug were ingested daily, jumpiness, shakiness, and other signs of nervousness were occasionally present (Table 1). When these symptoms were severe, the patients often cried bitterly in recounting their complaints. The other manifestations recorded in Table 1 include all the disturbances of clinical significance that could be attributed to the use of Thephorin in daily doses varying from 75 to 600 mg.

As a rule, untoward symptoms made their appearance in the first twenty-four to forty-eight hours after the administration of the drug was begun. Oftentimes this occurred with the first or second dose, particularly in the case of neurologic manifestations. In contrast, the gastrointestinal symptoms such as constipation, might not make their appearance until the fourth or fifth day after treatment had been instituted.

Toward some of the symptoms produced by the drug it seemed possible to establish a tolerance through continued use. This was particularly true of the insomnia and other manifestations of a presumptively nervous origin. With daily doses of 225 mg. or less such symptoms usually disappeared after several days without altering the amount of the drug administered. On the other hand there were symptoms, notably the dryness of the mucous membranes and the gastrointestinal disturbances, for which no tolerance could be established, regardless of dose.

Urinalyses, complete blood counts, electrocardiographic tracings, and blood nonprotein nitrogen determinations performed at weekly intervals in each of ten subjects for four weeks or more, showed no alterations directly related in any way to the influence of the drug.

From Table 1 it will be observed that the incidence of toxic symptoms was roughly proportional to the daily dose of Thephorin. With amounts of 300 mg. or less 25 per cent of the subjects showed some toxic reactions. With larger doses side effects were encountered in from 50 to 75 per cent of all subjects. In doses of 300 mg. or more daily, the untoward symptoms associated with the use of the drug were occasionally so severe that the subject discontinued the drug voluntarily.

It has seemed advisable to compare the inci-

TABLE 2.—INCIDENCE OF UNTOWARD SYMPTOMS FOLLOWING THE INGESTION OF SEVERAL ANTIHISTAMINE AGENTS

Agents	Per Cent Reactions at Daily Dose 150 Mg	300 Mg	450 Mg.	600 Mg	Outstanding Symptoms
Thephorin	24	50	58	75	Insomnia and drying of mucosae
Benadryl	64	78	76	91	Drowsiness
Pyribenzamine	64	64	73	66	Drowsiness nausea, anorexia, abdominal bloating

dence of unpleasant reactions caused by Thephorin with those of the now well-known antihistaminea gents, benadryl and pyribenzamine This is done in Table 2 The data for all three drugs were collected in similar fashion by the same observers, and at least 30 per cent of the subjects were used in all three trials It will be observed that at levels of 150 mg daily, which is the commonly indicated dosage, Thephorin is less than one-half as toxic as either of the other drugs mentioned At the highest levels of dosage, this difference was less marked, and the number of subjects forced to discontinue the antihistamine agent because of the severity of the symptoms was approximately the same in all three instances

Summary

1 Thephorin was given orally to 100 selected subjects in daily doses varying from 75 to 600 mg for periods of one week or more All symptoms of any nature whatsoever, not present prior to the administration of the drug, were recorded as due to its activity Data from subjects with intercurrent disease were discarded

2 The most frequently observed unpleasant manifestation of the action of the drug was dryness of the mouth, which occurred in 22 per cent of the patients but was more marked at higher than at lower levels of dosage In smaller doses, 300 mg daily or less, insomnia was the most common manifestation noted in 21 subjects This tended to decrease in severity as administration of the drug was continued

3 In all, 42 of the 100 subjects developed one or more toxic symptoms while taking Thephorin

4 The use of Thephorin for four or more weeks in the range of dosage above mentioned was not associated with any significant changes in the electrocardiogram, the nonprotein nitrogen of the blood, the peripheral blood count, or the urine

Conclusion

When compared with other drugs that have an antihistamine effect, namely, benadryl and pyribenzamine, Thephorin is less toxic weight-for-weight in daily doses ranging from 150 to 600 mg

References

1 Lehmann G Hagan E Barbarow G and Roe, M Federation Proc 6 350 (1947)
2 Lehmann G J Pharmacol & Exper Therap 92 249 (1948)
3 Wenner W and Plati, J T Synthesis of Pyridin dene Derivatives (to be published)

A NEW DRUG FOR THE ALLEVIATION OF PAIN

A new drug, made available in this country after World War II, has been found effective in the alleviation of many kinds of pain, according to an article in the April 13 issue of the *Journal of the American Medical Association*

The drug, which was given the nonproprietary name of methadon, is described by Elizabeth B Troxl, M.D , of the department of pharmacology of the University of Minnesota Medical School Clinical trials were instituted at the University of Minnesota Hospital on 400 patients for relief of all types of pain

By all routes of administration it was found that the average duration of action was from three to eight hours, with many of the patients obtaining relief for as long as eight to twelve hours The effects on the nervous, circulatory, and respiratory systems were similar to those of morphine

Investigators have found that methadon is more potent than either morphine or merperidine, and that in former morphine addicts the abstinence symptoms from morphine could be controlled with methadon

When methadon was withdrawn abruptly after prolonged administration, the symptoms were so mild that treatment was not necessary

Approximately 20 patients receiving methadon for two or three months had no withdrawal symptoms on abrupt discontinuation of treatment Three patients were given the drug for one year and were able to stop treatment abruptly without ill effects

Dr Troxl says that it was possible to use methadon to relieve muscular spasm and pain in patients with bulbar and spinal poliomyelitis and that it also was used effectively to relieve headaches due to brain tumor, head injury, and brain abscess

RECTAL POLYPS SHOWING EARLY MALIGNANT TRANSFORMATION

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POLYPI are frequently found in the course of routine proctologic examinations The patient may seek medical advice because of bleeding which, on examination, is found to be due to a polyp At times the complaint is protrusion on straining at stool, and, on examination, instead of hemorrhoids, a pedunculated polyp is seen A great many polyps, however are discovered during sigmoidoscopy performed as part of a routine examination for other diseases of the terminal portion of the intestinal tract.

The literature on this subject is extensive Bensuade, Hillemand, and Augier, Lockhart-Mummery, J C Lawrence, Manheim and Druckerman, W J Martin, and Manheim are a few among the many who have stressed the frequency of malignant degeneration of so-called benign polyps of the rectum [1–6]

It is obvious, therefore, that a biopsy is absolutely essential when any type of polypoid lesion is discovered on proctosigmoidoscopic examination The biopsy report will usually place the lesion in one of three groups, which are as follows (1) simple adenomatous polyp, (2) adenomatous polyps showing (*a*) increased mitosis (*b*) atypism, or (*c*) cellular dedifferentiation and (3) adenoma malignum.

The adenoma malignum is a frankly malignant lesion Its treatment is generally surgical and not *pertinent to this discussion* Polyps of the first two groups can be treated if they are accessible to the sigmoidoscope. If they are not, laparotomy is necessary Three cases illustrating the problems involved, are presented

Case Reports

Case 1 —A 59-year-old white man presented himself with a one-year history of protrusion at the anus and occasional, slight rectal bleeding On straining, he was found to have internal prolapsing hemorrhoids On digital examination, the examining finger detected a mass on the right rectal wall Sigmoidoscopy revealed this to be approximately 3 cm. in diameter and attached to the right wall of the rectum about 11 cm. from the anal orifice Inasmuch as the hemorrhoids were not bleeding this mass accounted for the bleeding about which the patient complained. A biopsy was performed and the pathologic report [illegible] specimen consists of fragments of an adenomatous polyp The polyp was fulgurated several times and four weeks later another biopsy was taken for examination. This second specimen was reported as fragments of villous adenoma showing focal early malignant transformation.

Case 2 —Another patient, also a white man, aged 64 was referred for proctologic examination because of a seven months history of diarrhea consisting of from two to six bowel movements each day The stools were usually quite loose, and a small amount of blood was occasionally noticed A barium enema had already been done and had been reported as showing diverticulosis and diverticulitis On sigmoidoscopic examination a polypoid mass was discovered on the left wall of the rectosigmoid approximately 10 cm. from the anus. It was about 2½ cm. in diameter and fairly smooth in outline The angulation of the rectosigmoid at this point rendered a complete view of the polyp almost impossible A portion was obtained for biopsy however and was reported as "adenomatous polyp Fulguration of this polyp was begun Four weeks later a second biopsy was taken and this time the report on it was "rectal polyp (papillary adenoma) with carcinomatous degeneration invading the submucosa and muscularis '

Case 3 —This patient was a 62-year-old white woman who complained of rectal bleeding, slight in amount, for a period of six months Bleeding occurred only on defecation On sigmoidoscopy a pea sized polyp was seen 7 inches from the anus. This was biopsied and it was reported to be an adenomatous polyp showing mitosis and nuclear atypism. The polyp was fulgurated The patient continued to bleed from a higher point. A barium enema was done and the presence of a polyp in the upper sigmoid was reported Sigmoidoscopy was repeated, and a polyp was found about 10 inches from the anus. A portion of this was removed with a cautery snare and the biopsy report was adenocarcinoma of infiltrating tendency within a fragment of rectal polyp In view of the fact that this polyp was only noticed on one of several sigmoidoscopic examinations it was felt that the polyp reported by the roentgenologist was the same as that which was biopsied. Accordingly laparotomy was suggested for the removal of this polyp At operation a polyp approximately 2 cm. in diameter on a short, broad pedicle was found high up in the sigmoid colon.[7] This was removed by sigmoidotomy The pathologic report revealed the polyp to be an adenoma, in one portion of which carcinomatous changes had occurred. It was from this portion that the biopsy had been taken

At the time of the first biopsy in the first two cases surgery involving opening of the gut or resection was obviously too drastic a procedure for the treatment of a benign lesion. Fulguration in stages was safe and thoroughly adequate. However, when the later biopsies were done, the diagnosis of 'early malignancy" replaced that of "benign polyp ' Accordingly the patient was

referred for hospitalization and radical resection In the last case, after one polyp had been destroyed by fulguration and the second had been found on sigmoidoscopy only as a result of a partial intussusception, surgery was obviously the only possible treatment

Thus we see that an exact histologic diagnosis of rectal polyps is of the utmost importance Simple fulguration can effect a complete cure in benign lesions However, it would prove a fatal blunder in the treatment of those in which malignant degeneration has already occurred, for the malignancy can advance and metastasize in the latter, while the surface of the polyp is blithely being fulgurated

Will the choice of a particular site in taking the biopsy solve this problem? No It has been claimed by some that the transition from simple adenoma to carcinoma always starts at the tip of the polyp Others have been equally certain that this change begins at the base The more recent work of Helwig shows beyond all doubt that no definite pattern can be established [8] Carcinomatous changes may occur at the tip, margins, near the stalk, or at the base of a polyp In addition, it must be remembered that, histologically, no particular group of adenomas can be expected to maintain a constantly benign course If the complete destruction of a polyp cannot be accomplished in one or two treatments, then, as the base of the polyp is approached, repeated biopsies must be done

At the present time, the tremendous campaign for the early diagnosis of cancer is bringing us more patients for early examination and treatment If the end results of surgery for carcinoma of the rectum and rectosigmoid are to be improved, we must remember at all times that the benign polyp of the rectum is potentially a malignant tumor

References

1 Bensaude R Hillemand P and Augier, P Ann. de méd 34 5 (June) 1933
2 Lockhart-Mummery J P Lancet 1 1149 (1935)
3 Lawrence, J C Am J Surg 31 499 (1936)
4 Manheim S D, and Druckerman L Ann. Surg 108 1107 (1938)
5 Martin, W J Tr Am Proct Soc 40 176 (1939)
6 Manheim S D Proctology 1st ed New York Oxford University Press 1943 p 77
7 Druckerman Leonard Personal communication.
8 Helwig E B Surg Gynec & Obst. 84 36 (Jan) 1947

SAYS CONVICTS DISPLAY PSYCHOSOMATIC NEEDS

Family tension, even of a subtle nature, breeds physical and mental ills and may develop children into criminals, says Dr David Abrahamsen of Columbia University's psychiatry department Having made a four-year study of convicts, Doctor Abrahamsen declares that half the prisoners had psychosomatic disorders, including symptoms of cardiac, neurologic, skin, and respiratory diseases These he links with evidences of anxiety, envy, cruelty, and lack of affection "In all the families examined," he says, "there was an emotional tension This was found to be a breeding place for hostility and resentment"

—*Medical Economics, June, 1948*

TEACHING AND RESEARCH FELLOWSHIPS IN TUBERCULOSIS

Establishment of a number of teaching and research fellowships in the field of tuberculosis by the National Tuberculosis Association has been announced by Dr Esmond R Long, director of the NTA's Division of Research. The action was recommended by the executive committee of the NTA's Medical Section, the American Trudeau Society

Annual stipends for the fellowships will range from $2,400 to $3,200, according to Dr Long Provision will also be made for laboratory fees and incidental expenses of like character

The fellowships will be limited to graduates of American schools for teaching and investigation in the United States While preference will be given to applicants with a Doctor of Philosophy or Doctor of Medicine degree, fellowships will not be restricted to the holders of these degrees

Applications will be considered in the fields of pathology and bacteriology, clinical medicine, epidemiology, and social and statistical research Applicants may elect the institutions in which they wish to study

Persons interested in obtaining a fellowship should write to Dr James E Perkins, managing director, National Tuberculosis Association, 1790 Broadway, New York City 19, for further information

X RAY INJURIES THE PREVENTABLE OCCUPATIONAL HAZARD

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(From the Iola Sanatorium and the Eastman Kodak Company)

IN A recent survey of the vocational ailments suffered by physicians, x ray injuries are listed third This is a deplorable situation The early victims of x rays are justly honored as martyrs to their science Most of the recent victims are, to put it as bluntly as possible, fools. In this day there is practically no excuse for any one being injured by x rays or radium. The means of protection are known, standardized, and easily available.

The great majority of x ray installations today are just as safe as designing can make them The injuries arise from ignorance, carelessness, or haste In many cases the safer procedure is the longer one. The dangerous attitude is that "just this once won't matter" Just once does not matter, but a careless habit does

Potentially, the most dangerous x ray procedure is fluoroscopy A lead apron and lead gloves are clumsy, hot, and heavy but fluoroscopy should *never* be done, even once without them. The pleasures of being deft cool and unburdened should not be associated with the use of a fluoroscope The main danger is not the direct beam which produces the image, for that is effectively stopped by the lead glass covering the fluoroscopic screen The hazard lies in the x rays scattered by the body of the patient. If an assistant habitually stands at the doctor's elbow to observe or make notes, he too should wear an apron, since his exposure to the scattered x-rays may be as great as or even greater than the physician s

Above all, never palpate directly with the hand or operate under the fluoroscope, even when wearing lead gloves, except in extreme emergencies When it is essential to manipulate under the fluoroscope, the beam should be reduced to strike as small an area as is practical, and the hands should be kept outside the irradiated area as much as possible The lead contained in a glove is sufficient protection from the scattered radiation but cannot be relied upon to protect from the direct beam Thus is particularly true if the gloves are old or cracked If the lead glass covering the fluoroscopic screen needs replacement, it should be done by the company that supplied the fluoroscope In that way it is certain that lead glass of the proper protective value will be used

Radiography is far less dangerous than fluoroscopy yet offers several excellent chances for making costly mistakes It is the doctor's moral responsibility to see that his technician follows safe practices Neglect of the moral responsibility may lead to a financial one

Both doctor and technician should avoid the direct x ray beam from the tube In addition both should avoid the radiation scattered from the patient the equipment and the walls or floors The control stand should be in an adequately protected enclosure in which the technician should remain during the course of the exposure This is particularly important in large busy x-ray departments and in mass x ray surveys which are frequently conducted in surroundings not designed for radiography In addition the second technician, usually employed in mass surveys to position the patients, should always retire behind a protective screen or enclosure during the course of the exposure In mass surveys it may also be necessary to look to the protection of clerical personnel whose desks may be near the x ray apparatus.

A point often overlooked arises in the radiography of children or other patients unable to cooperate If it is necessary to hold the patient, this should never be done by the doctor or the technician The person accompanying the patient should be instructed in how to hold him in position the reason being of course, that the layman is very rarely exposed to x rays and has a correspondingly remote chance of developing injuries The time consumed in instruction and the occasional film wasted are of less significance than the possibility of x ray damage to the hands of the physician or technician

X ray equipment at least has the advantage of a formidable appearance, which keeps the need for safe practices constantly in the mind of the user Radium lacks this advantage The extreme simplicity and silence of the apparatus lulls the observer This coupled with the fact that radium cannot be turned off but instead gives out radiation day and night without interruption makes it a great source of potential danger It also requires that thought be given to the storage of radium as well as to its use.

As to the storage of radium, tables have been prepared giving specifications for lead storage containers for various amounts of radium. The only protection problem in storing radium, then is to follow existing recommendations meticulously In the use and handling of radium prepa-

rations, the protective recommendations can be summed up in a few words—*Keep your hands away!* No radium needle, capsule, or applicator or no radon seed should ever be handled directly, either with the bare hands or with lead gloves All manipulations should be done with long tongs or forceps, clumsy though they may be If considerable work is to be done, such as the threading of several radium needles at one time, a heavy lead shield should be used, containing a thick lead glass window for observation The shield should be large enough to protect the body and head of the operator, who reaches around it on either side to perform his manipulations with tongs or forceps

To transport radium in a hospital, a case or small cart having a heavy-walled lead container should be provided The case or cart should have a handle at least three feet long The design should be such that it is impossible, or at least inconvenient, to convey the case or cart other than by the handle If radium is habitually carried in an automobile, it should be stowed as remotely as possible from the driver and passengers

Safety against x-ray or radium implies, of course, a safe installation There is no need here to discuss the details of design and construction of x-ray facilities The information is available from architects familiar with hospital design and from many publications such as the Bureau of Standards Handbooks, Handbooks 20 and 23, *X-ray Protection* and *Radium Protection*,* and the American Standards Association's *Safety Code for the Industrial Use of X-rays* † The latter, although directed toward the requirements of industrial radiography, contains a compilation of the most recent information on the protection of personnel from x-rays and gamma rays In addition, application to either of the radiologic societies will provide a list of physicists competent to advise on matters of measurement of and protection from radiation A final point, sometimes overlooked in the installation of x-ray equipment, is the innocent bystander in the next office or the floor below It is quite possible for an x-ray machine to be entirely safe for those using it and yet be a menace to a neighbor

Some means to measure, or at least to check occasionally, the radiation received by the personnel of an x-ray department is advisable One good method is the use of small ionization chambers which will total up the radiation received over a period of time These look much like fountain pens and are carried during working hours At the end of each day, or some other convenient period, each is checked to see how much radiation it has received Ionization instruments are also available which will give a quick indication of the stray radiation at any point

If ionization equipment is not continuously available, rough checks may be made with x-ray film The packets used for dental radiography are convenient A dental film is carried by each member of the department for a certain time, and then developed If possible, calibration films which have been exposed to known amounts of radiation should be developed simultaneously Information on films suitable for this purpose may be obtained from the manufacturers

Tests such as these serve the double purpose of checking on the adequacy of the protective measures and on the safety habits of the department personnel An indication of excessive exposure should be cause for an investigation of the protective measures and of the conduct of the personnel

In dealing with x-rays or radium, remember that lead is cheap, and time is cheap, a physician's hands and health are priceless

* Superintendent of Documents Washington 25 D C Ten cents each.

† American Standards Association 70 East 45th Street New York City 17 $1 50

FELLOWSHIPS IN PUBLIC HEALTH AVAILABLE THROUGH THE NEW YORK STATE DEPARTMENT OF HEALTH

Dr Herman E Hilleboe, New York State Health Commissioner, announces the availability of fellowships for young physicians interested in entering public health as a career The fellowships are for a period of two years or less, depending upon the qualifications of the applicant Both field training and academic training leading to a degree of Master of Public Health are given during the period of the fellowship, which carries with it a stipend of $3,600 per year In addition, necessary travel and other expenses are paid as well as tuition at a school of public health

Application blanks and further information may be obtained by writing to Dr Franklyn B Amos, New York State Department of Health, Governor Alfred E Smith State Office Building, Albany 1

SEVERE DIABETIC ACIDOSIS WITH EXTREME LOW CARBON DIOXIDE COMBINING POWER

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New York City

(From the Department of Medicine, Queens General Hospital)

IN DIABETES any conditions accelerating the loss of glycogen from the liver, such as endocrine disturbances, infections, anesthesia, or vomiting, will contribute to the development and severity of diabetic coma Glycogen starvation of the liver without diabetes as observed in fasting and intense hyperthyroidism never produces a condition resembling diabetic coma It is only when insulin deficiency is present that glycogen impoverishment of the liver becomes an important element in the clinical status

Case Report

R. G a Negro married housewife, aged 34 was admitted in coma to the Queens General Hospital at 7 20 A.M on January 6 1947 She had been found unconscious three hours previously

The history revealed that she had noted weakness nervousness polyuria polydipsia and weight loss for four months. One month before admission she was seen in her home by a physician because of 'collapse and was told she had 'blood pressure elevation to 180' No urine analysis was done She was given varied colored tablets for weight reducing. It was ascertained that one of these contained 1 grain of thyroid and 5 mg of amphetamine sulfate others contained atropine sulfate and phenobarbital. This medication had been taken by the patient for the month prior to admission

Her menses had been on the twenty-eight day cycle, five-day flow type until two weeks after starting these medications when she had a one-day period

Physical examination on admission showed an obese, Negro woman in deep coma with Kussmaul breathing and an acetone odor of the breath. Her skin was dry and cool the pupils were in middilation and responded sluggishly to light. The fundi were normal, lips were dry tongue parched. There was no nuchal rigidity The neck vessels showed no distention, nor was there any thyroid enlargement. The breasts were large no masses felt. The lungs were resonant throughout. The heart sounds were distant but regular in rate and rhythm no murmurs were heard The abdomen was soft. The deep reflexes were hyperactive although no pathologic reflexes could be obtained. Temperature was 98.6 F pulse 136 respirations 30 A catheterized specimen of urine showed a 4 plus glucose and 3 plus acetone The blood taken on admission was reported at 9 30 A.M as containing 1 100 mg. per cent glucose and carbon dioxide combining power 3 volumes per cent. It was believed that there had been an error in determining the carbon dioxide combining power and additional specimens were immediately taken. Two independent tests were performed and both showed a carbon dioxide combining power of 3 volumes per cent

The laboratory data were reported as follows *urine analysis specific gravity* 1 026 *pH* 6.0 3 *plus* albumin occasional granular casts and few white and red blood cells. Blood count revealed hemoglobin 81 per cent red blood cells 4,200 000 white blood cells 12 000 and 65 per cent polymorphonuclears Additional laboratory reports are shown in Table 1

During the first twelve hours the patient received 1,000 cc. normal saline solution 4 000 cc. Hartman s buffered lactate solution 75 Gm. of glucose and 1 600 units of intravenous insulin

TABLE 1 —LABORATORY REPORTS DURING FIRST TWELVE HOURS (JANUARY 6 1945)

Time	Blood Sugar in Mg. Per Cent	Carbon Dioxide Combining Power Volume Per Cent	Urine Glucose	Urine Acetone
9:30 A.M.	1 100	3	4 Plus	3 Plus
12 Noon	789	5	4 Plus	3 Plus
2 10 P M	593	5	4 Plus	3 Plus
3 30 P.M.	420	4	4 Plus	3 Plus
4:30 P M	315	12	4 Plus	4 Plus
6:30 P M	162	13	3 Plus	2 Plus
8 00 P M	123	16	1 Plus	2 Plus
9 00 P M	97	19	0	1 Plus

During the second twelve-hour period 2 500 cc of 5 per cent glucose in saline was given with 100 mg each of cevitamic acid and thiamin chloride The urinary output was 100 cc. during the first twenty four hour period

On the second day January 7 2,000 cc of 5 per cent glucose in normal saline and 2 000 cc. of Hartman s solution were administered as well as 100 units of insulin The blood sugar was 210 mg. per cent, and the carbon dioxide combining power had risen to 24 volumes per cent Signs of renal irritation continued with albuminuria and cellular elements in the sediment the output of urine increasing to 1 200 cc. The urea nitrogen was 34 mg per cent, serum chlorides 99 mg. per cent (normal 570) serum protein 7.6 per cent, hematocrit 45 volumes per cent. The temperature was 102 F at 8 00 A M but dropped to normal at noon and remained normal thereafter The patient was less hyperpneic but had not yet roused.

The carbon dioxide values fluctuated during the first two days but rose to 44 volumes per cent on the third day The patient became alert and responsive with a blood sugar of 235 mg per cent urea nitrogen 20 mg. per cent, and blood cholesterol 220 mg per cent A Kline test taken this day and one five days later were both reported as negative Blood pressure was 128/82

During the next ten days the glycosuria gradually diminished on a diet of 150 Gm of carbohydrate, 80 Gm of protein and 60 Gm of fat with crystalline insulin between 90 and 110 units daily in divided doses After ten days, the insulin was further reduced to 35 units of protamine zinc and 15 units of crystalline taken together in the morning From the tenth to the thirteenth day there was moderate ankle edema On the eighteenth day the insulin was stopped with no glycosuria, the blood sugar value then was 95 mg per cent Gynecologic examination was essentially normal Blood cholesterol on January 25 was 190 mg per cent Urine tests were normal Blood pressure was normal

On the twenty-second day of her hospital stay, the patient signed her release and left before further investigation could be completed No further contact was made with her

Discussion

This case has several points of interest It is reported primarily because of the extremely low carbon dioxide combining power Speculation as to the cause of the acidosis on the one hand and the high blood sugar level with prompt and seemingly complete recovery are of added interest No infection could be detected It is noted that this patient had been taking thyroid substance, 3 grains daily for about one month According to Means, thyroid substance inactivates insulin [1] He states further that "hyperthyroidism unquestionably aggravates diabetes mellitus" There is evidence that total thyroidectomy ameliorates diabetes [2,3] Means cites a case with both myxedema and diabetes mellitus [1] The administration of thyroid relieved the myxedema and intensified the diabetes When the patient was again allowed to become myxedematous by the omission of thyroid substance, the diabetes became milder Indeed, when fully myxedematous, the patient had no recognizable diabetes On resumption of thyroid, the diabetes returned

The feeding of thyroid substance mobilizes body glycogen Barnes showed that thyroid-fed dogs with both the pituitary and pancreas removed, did not intensify their mild glycosuria [4] The heart rate was increased, but the polyuria and diarrhea, usually observed with thyroid feeding, did not occur By injection of pituitary extract, a severe glycosuria could be produced Barnes' "working hypothesis" then was that the thyroid may exert an influence upon carbohydrate metabolism through the pituitary, which in turn may influence the adrenals

Houssay diminished or abolished diabetes mellitus by removing the pituitary gland in pancreatectomized dogs [5] He showed that pituitectomy caused hypersensitivity to insulin and that the severe diabetes caused by pancreatectomy can be reduced to a mild form by pituitectomy Long removed the thyroid in pancreatectomized animals to see if it would have a similar effect [6] Ketosis was diminished, but the diabetes mellitus was not affected Removal of the adrenals, however, had the same effect on pancreatic diabetes as pituitectomy Long believes that through its corticotropic hormone the anterior pituitary increases the production of carbohydrate from protein, the cortical hormone being necessary in the action The evidence for this is that a Long cat (pancreas and adrenals out) will live as long as a Houssay dog (pancreas and pituitary out) However, a Houssay dog will have a return of diabetes when given anterior pituitary hormone, a Long cat will not

Woodyatt says, "glycosuria associated with hyperglycemia is a common accompaniment of various endocrinopathies with various gland extracts (pituitary, adrenal thyroid)" [7] He did not cite ketosis

The casual relationship between the ingestion of thyroid substance for a certain period and the pathology found in this patient is not absolute The hyperglycemia and ketosis caused in this case were severe (1,100 mg per cent of glucose, 3 volumes per cent carbon dioxide combining power, and serum chlorides 99 mg per cent)

Even though the evidence of direct and specific hormonal antagonism between the thyroid and pancreatic islets seems impressive, it is not conclusive [1] A common cause for diabetic acidosis in a patient receiving thyroid substance is the direct effect of thyroid extract on the adrenal gland itself Reifenstein says that in animals a considerable enlargement of the adrenals occurs, and, in all probability, this results in an increase in the production of adrenal cortical steriods of the type that cause conversion of protein to carbohydrate [8] This type of hormone is found in excess in Cushing's syndrome where one has insulin-resistant diabetes [9] Our patient was moderately insulin-resistant and required large amounts of insulin

At the same time, one cannot exclude the possibility that the thyroid increased the amount of glycotropic hormone or that it aggravated the diabetes nonspecifically by increasing the metabolic rate, similar to that caused by infections This metabolic rate rise increases carbohydrate requirements and overworks the already incompetent pancreas

The treatment followed modern standard methods It is beyond the scope of this paper to discuss the therapy of diabetic acidosis and acid-base relationships Further follow-up of the case was not accomplished One would have desired basal metabolic readings, glucose and insulin tolerance curves, further blood cholesterol determinations, menstrual cycle history, and pregnancy tests among other details

Summary

An obese, adult Negro woman was seen and treated after the abrupt onset of diabetic acidosis following ingestion of 3 grams of thyroid extract daily for about one month Her acidosis was severe The repeated carbon dioxide combining power readings were below those usually considered compatible with life, but she recovered promptly following large doses of electrolytes and insulin

References

1 Means J H.: Thyroid and Its Diseases, Philadelphia, J B. Lippincott 1938, p 248.
2. Wilder R. M., Foster R. F and Pemberton J de J Endocrinology 18 455 (1934)
3. Rudy A Blumgart H. L. and Berlin, D D Am. J M Sc. 190: 51 (1935)
4 Barnes, B O : Am. J Physiol 109 5 (1934)
5. Houssay B A. and Biasotti A. Endocrinology 15: 511 (1931)
6. Long, C. N H.: Ann. Int. Med. 9: 166 (1935)
7 Woodyatt, R. T Tr Inst. Med. Chicago, 1945.
8. Reifenstein, E. C. Jr.: Personal communication, 1947
9 Albright Fuller Lecture Postgraduate Course A C.P Harvard University 1946.

MARSHALL SAYS WORLD CANNOT ISOLATE DISEASE

Medical isolation in the modern world is as impossible as political or economic isolation, Secretary of State George C. Marshall said at the opening session of the International Congresses on Tropical Medicine and Malaria.

Mr Marshall said these diseases presented an international problem that 'should be solved by a pooling of the genius and the resources of many nations.

In modern life, he told delegates from 41 nations 'there is no way we can escape the consequences of each other s mischief or misfortune.

Marshall told the delegates that since their last meeting at Amsterdam in 1938 the world has been subjected to another terrible ordeal of war which had threatened to cancel mankind s progress in medicine

"Seldom are we able to get at the remedy for the mass misery that develops discontent misunderstanding and violence' he said 'That is your particular province in which you labor as benefactors of mankind.

Mr Marshall said the conquest of diseases and the maximum production of foodstuffs on lands not now very productive are tremendously important requirements of the world situation. Tropical regions he added hold the key to both necessary advances

'Little imagination is required, ' he continued 'to visualize the great increase in the production of food and raw materials the stimulus to world trade and above all the improvement in living conditions with consequent social and cultural advances that would result from the conquest of tropical diseases

SCIENTIST OFFERS NEW HOPE FOR PAIN RELIEF

Introduction of "new and powerful analgesics for pain relief' were cited as examples of progress in American synthetic medicinal research by Dr C M Suter, director of the chemical division of the Sterling Winthrop Research Institute, Rensselaer New York. He was addressing a sectional meeting of the American Chemical Society in Akron Ohio

Dr Suter pointed out it has been almost ten years since the discovery of the first powerful analgesic, now in wide use under the common name of meperidine and the trade name Demerol for control of serious pain of a variety of types.

Reviewing recent advances in medicinal research, Dr Suter declared that since the war it has assumed a more diversified aspect and is again directed chiefly toward the health problems of this country rather than those of foreign areas.

"Most of the recent progress, as measured by new drugs just announced and those in prospect has been in the development of products having pharmacodynamic rather than chemotherapeutic action, ' he said.

'In other words, this means new drugs useful in alleviation of discomfort or control of pain, rather than the cure of diseases caused by pathogenic organisms

"The manufacture and introduction of new drugs, except for the most critical items was not possible during the war period because of the shortage of manufacturing and packaging materials.

Therefore new synthetic medicinals are now appearing on the market, which represent the development of discoveries made during 1940–1945 " Dr Suter concluded

PHOTOSENSITIZATION THERAPY OF ACNE VULGARIS

ABNER KURTIN, M D , New York City, and REUBEN YONTEF, M D , Bayonne, New Jersey

IT IS A banal observation that the majority of patients with acne vulgaris enjoy a partial or complete remission of their disease in the summer months "The sun is good for my skin" is a remark frequently made by acne sufferers This phenomenon led us to a new approach in the treatment of acne The purpose of this therapy is to photosensitize the involved skin and thus enhance the beneficial effect of ultraviolet radiation

For the past five years we have experimented with various known light sensitizers, alone and in combination, in an effort to create an ointment which would be effective in the treatment of acne

The final effective formula which we have used is as follows

Crude coal tar	5 per cent
Sulfur	5 per cent
Sulfathiazole	5 per cent
Lanolin,	
Lassar's paste, equal parts ad	

The patient is instructed to apply this ointment to the diseased areas every night and to remove it in the morning with the help of soap and water or sulfonated oil Unfortunately, the ointment is black and lacks cosmetic elegance It will stain bed linen, and the patient should be advised of this fact It takes approximately one week for the skin to become sensitized A few minutes' exposure to bright sunlight is then sufficient to cause a burning sensation which in a few hours will be followed by an erythema The patient's threshold of pain tolerance is an adequate safety valve in the prevention of overexposure The skin will tan rapidly and in a few weeks the tolerance to ultraviolet becomes normal

A slight increase in pustulation may be seen during the first week Therapy should be continued This effect is temporary and perhaps of value in the elimination of comedones Within ten days a marked improvement is noted, and by the end of the fourth week a majority of the patients have a satisfactory clearing of the skin.

It has been our custom to fortify this treatment with weekly exposures to ultraviolet light This is of added importance in the winter months when adequate exposure to sunlight is not possible The sensitized skin will react violently to the standard erythema dose It is prudent, therefore, to begin at one half the usual exposure and increase the dosage cautiously each successive week Manual removal of comedones after the second week of therapy will expedite healing

It is of interest that coal tar has a beneficial effect on acne, despite the fact that it is an agent capable of producing acneform lesions if applied for an adequate length of time We have rarely continued our patients on this treatment for periods longer than one month and at no time have had such a sequel from the use of the tar

Sulfathiazole ointment, when used alone, does not have any demonstrably curative effect in acne We think that it works in this combination as a synergistic photosensitizer and that the bactericidal properties play a very small part In our experience, sulfathiazole is not capable of producing contact dermatitis when used on unbroken skin The above formula has been used on approximately five hundred patients without causing dermatitis of the contact type The disease may recur after several months It may then be kept under easy control by occasional applications of the ointment

We have reviewed the results in our last 100 treated cases (Table 1) This represents an unselected group of varying ages and degrees of acne Many had been treated unsuccessfully in the past with x-rays

The above series of cases was treated by us in private practice A much larger series was treated equally successfully by us as Army dermatologists, and several practicing dermatologists have confirmed our opinion as to the efficacy of the above preparation

No therapy yet reported has given this uniform and predictable result A small group of acne rosacea, infective eczematoid dermatitis, and sycosis barbae cases has responded to this ointment In an effort to eliminate the disagreeable black color we are now substituting the various photosensitizing tar fractions

TABLE 1 —RESULTS IN LAST 100 TREATED CASES

Time Period	Percentage
Clear in 2 weeks	20
Clear in 5 weeks	35
Clear in 12 to 16 weeks	45
Total	100

Diabetics deserve a periodic chest x-ray for tuberculosis —*Exchange*

The edentulous patient seldom has a lung abscess —*Exchange*

VALUE OF UROGRAPHY IN ELUCIDATION OF NONUROLOGIC COMPLAINTS

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(From the Urology Department of the New York Polyclinic Medical School and Hospital)

THERE is considerable variety in topographic and symptomatic manifestations of visceral disease. A confusing factor in localizing pathology is the existence of common routes of sympathetic innervation for the kidneys and the abdominal viscera. The renal organs derive their nervous supply from parts of the solar plexus and the aortic renal ganglion, to which centers are distributed filaments from the splanchnic nerves. These nerves also supply branches to important organs in the abdominal cavity. Outstanding symptoms of diseases of the urinary tract above the level of the bladder are such complaints as indigestion, eructations, nausea, vomiting, and distention. An extremely high percentage of patients proved to be suffering with renal or ureteral disease, particularly on the right side, display abdominal scars incident to operations on the appendix, gallbladder, uterus or adnexa. Before some chance posterior localization of pain or positive urine findings focus attention upon the urinary tract, the multiple complaints of the patient often result in many losses of viscera with disappointments about obtaining relief. The continued frequency of major maldiagnoses of this type warrants periodic emphasis on some points of general knowledge which should enhance our success in early recognition of the true pathology.

Failure to find pathologic elements in the urine does not preclude existence of urinary tract disease. For example, an uninfected hydronephrosis will give a normal urinary picture, and entrance of urine from an infected kidney pelvis often is barred by tight closure of the ureter.

When gastrointestinal studies fail to reveal obvious findings to account for complaints referable to that system an intravenous urogram should be done. This procedure performed with the customary caution is relatively innocuous and may give the clue to diagnosis, either by revealing intrinsic urinary system disturbance or by revealing anatomic displacement, or distortions of kidney, ureter or bladder shadows may suggest neighboring disease.

Case reports illustrative of the value of the urogram in such instances follow.

Case Reports

Case 1.—The patient was a young married woman, 34 years of age. Urologic investigation was initiated by a casual remark by her nephrectomized husband that very likely his wife's troubles (diagnosed as gallbladder disease) were of kidney origin too. The story was one of ten years' duration of frequent right upper quadrant seizures of pain with gastric upsets. X-ray study of the gastrointestinal tract and gallbladder were negative, and treatment prescribed on the basis of a chronic cholecystitis had been unsatisfactory. Intravenous urography in a symptom-free interval revealed a mild right-sided hydronephrosis due to constriction at the ureteropelvic level and a normal left kidney (Fig. 1). The patient was prevailed upon to undergo cystoscopic study and on filling the right kidney pelvis with 40 cc. of fluid, the "gallbladder" symptoms reappeared.

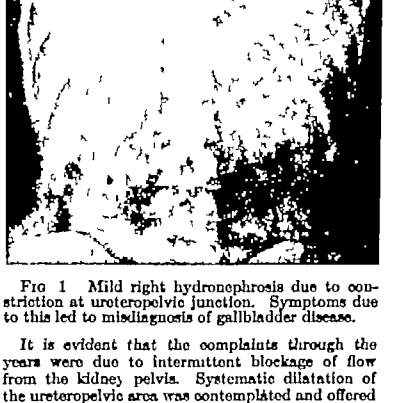


FIG. 1.—Mild right hydronephrosis due to constriction at ureteropelvic junction. Symptoms due to this led to misdiagnosis of gallbladder disease.

It is evident that the complaints through the years were due to intermittent blockage of flow from the kidney pelvis. Systematic dilatation of the ureteropelvic area was contemplated and offered to the patient as a conservative measure to improve drainage to be followed by surgery if unsuccessful. She, however chose to revert to the original diagnosis of gallbladder disease and its more comfortable therapeutic regime. She seems to be a good candidate for eventual nephrectomy.

Case 2.—The patient was a 30-year-old man complaining of intermittent terminal hematuria with suprapubic and scrotal pains for two weeks. For about two months previous, the patient had been suffering from an old epigastric pain attributed

to an "ulcer," despite four negative x-ray studies During his many years of ulcer doctoring, the patient became discouraged and frequently abandoned all therapy Despite this, there were sudden unaccountable disappearances of complaints In the present illness there was an additional element of right lower quadrant pain of a colicky type which settled essentially suprapubically with radiation to the scrotal area

Cysto-urethroscopy and retrograde studies yielded the following significant findings diffuse cystitis, normally located ureteral orifices, slightly delayed function on the left as indicated by indigo carmine return In the posterior urethral floor, just distal to the internal sphincter, there was an irregularly scooped out area which to the examiner suggested a recent abscess pocket X-ray studies (Fig 2), showed a crossed ectopia, the left nephrogenic mass having completed its development on the right side of the spine in a low position The normally located right kidney was incompletely rotated The two kidneys were probably fused



Fig 2 Lower kidney mass illustrates a crossed ectopia. It is probably fused with the normally located, incompletely rotated right kidney

A small jagged calculus was passed in ten days and the patient was relieved of all complaints

Congenitally abnormal kidneys are usually inefficiently drained, and, in the foregoing case, we may surmise that intermittent episodes of pelvis overdistention, more likely in the lower kidney, accounted for the "ulcer" symptoms Sudden relief of the obstruction afforded sudden relief of epigastric complaints Stasis is one of the major factors responsible for calculus formation A calculus, then forming in the lower kidney pelvis, progressed to the prostatic fossa where it embedded itself in the pocket noted at urethroscopy and produced the acute urinary distress With extrusion of this, treatment relegates itself to periodic study of possible progression in drainage defect or infection and treatment as needed

Cystogram

Adequate dye is usually secreted in the late urogram films to outline bladder contour This viscus, secondarily irritated, frequently presents the first manifestation of urinary tract pathology and appropriately has been termed the mouthpiece of that system It may also serve to give a neighborly warning of otherwise undetected disturbances in pelvic organs Uterine displacements or large growths may create distortions of the bladder and by pressure effects on vesical circulation produce trigonal and bladder wall hyperemia with urinary symptoms Occasionally, a tumor may so mold itself into the pelvic cavity as to force the base of the bladder against the symphysis and create an acute retention

Case 3—The patient was a moderately obese woman, in the late forties, married, mother of two grown children, referred for study of urinary frequency and dull ache in the lower abdomen Urine was clear and uninfected Cystoscopy revealed some moderate papilledema of the internal sphincter and bladder wall congestion Renal and ureteral architecture were normal on urogram The bladder



Fig 3 Defect in bladder contour due to extrinsic pressure by chocolate cyst

contour however suggested extrinsic pressure on the fundus from the left (Fig. 3) Pelvic examination was not informative because of the patient's obesity and inability to relax. With attention focused on the genital system however a small fungating mass within the os utori was discovered Diagnosis of early adenocarcinoma was made In the course of laparotomy for total hysterectomy a large left-sided, chocolate cyst grapefruit size was found and removed

Summary

Unexplained gastrointestinal reflex complaints are often due to hidden urinary tract pathology which may be brought to light only by urogram study Two illustrative cases are presented The urogram is of aid also in discerning nonurologic disturbances by study of the impressions of extrinsic masses upon urinary tract architecture. This is especially true in the bony pelvis, and a case is presented showing detection of a cystic mass via its influence in producing defect in the bladder contour

390 WEST END AVENUE

WHO TO RECORD WORLD'S VITAL AND HEALTH STATISTICS

The decision to transfer to WHO all authority and responsibility in the field of international health statistics, including recording of births diseases, and deaths was taken by the International Conference for Revision of International Lists of Diseases and Causes of Death convened by the French Government at Paris in late April

Thirty countries participated in this Conference, the technical preparation for which was entrusted to WHO's Interim Commission The Conference was opened by French Foreign Minister Georges Bidault.

The objectives of the recommended program are to make available to all interested administrations and specialists comparable health statistics collected the world over, and thus facilitate the study of health problems.

A program of medical statistical research is also contemplated including studies of cancer registration and statistics, problems concerning statistics of malaria, morbidity and mortality from tropical diseases, foetal and infantile deaths, the influence of the confidential character of medical certification on the accuracy of resulting statistics and other studies

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NEW DRUG FOR MALARIA

A new drug, announced as having been developed in the laboratories of Columbia University's College of Physicians and Surgeons and Schering Corporation Bloomfield and Union New Jersey was markedly effective in the treatment of cholera during the recent epidemic in Egypt.

The drug which is called phthalylsulfacetimide was used on more than 500 patients in Egypt Records were maintained on only 43 *patients*, however because of the lack of trained personnel and the chaotic conditions accompanying the epidemic Among these 43 patients treated with the drug only one died. In contrast official Egyptian Government figures have disclosed that among the 20,781 persons who were stricken with cholera, 10 273 died

The discovery was made by the medical scientists while they were engaged on a research project of a different nature. They started their work with the drug in an attempt to prove that it was effective against dysentery When this was ascertained they recognized its potential value in the treatment of cholera.

Once the discovery became known, Dr Seneca was *flown to Cairo* where the drug was immediately pressed into service

The physician left 1 000 cases of the compound with the Egyptian Government for use in the event another epidemic should break out.

It was emphasized that the drug was thoroughly tested before it was used to treat cholera patients

Special Article

THE NEW YORK STATE MEDICAL LIBRARY'S SERVICES TO PHYSICIANS

Prepared by Maude E Nesbit, Medical Librarian, New York State Library, Albany, New York

DOCTORS in the State's 62 counties are now receiving the benefits of a State law passed in 1891 The Legislature of that year established the New York State Medical Library, making it available "to every accredited physician residing in the state" By virtue of this act, doctors throughout the State have access to the latest medical information and are given the opportunity to do research and study in their profession

Regardless of where in the state a doctor has his practice, he is able to borrow books and have them sent right to his office from the State Library, which is located in Albany In many of the rural areas, doctors have no local research facilities available, and, in these cases, the State Library is their main source for obtaining books Doctors practicing in cities also find it convenient to borrow from the Library, where they can obtain books for home use

The service of the Library in preparing special bibliographies on any subject requested is one which doctors in communities of all sizes find valuable A trained staff of librarians is prepared to serve in answering all questions, making research materials available, and furnishing these bibliographies for professional reference

The State Medical Library has an extensive collection of over 60,000 volumes, covering all medical subjects In addition, the Library houses thousands of pamphlets, reprints, and reports issued by the various public health agencies of municipalities and other states and countries Over six hundred medical journals, American and foreign, are currently received

In 1891, the Library began with a collection of about 2,500 volumes donated by the Albany Medical College with the understanding that students of that institution would have access to the entire Library This original collection, along with the many volumes received after 1891, was entirely destroyed in the Capitol fire of 1911 The Library was then given quarters at its present location, the Education Building, where it has been developing through the years to its present size Under the direction of the medical librarian the collection is continually being increased, and physicians are encouraged to submit recommendations for new books

A catalog of the entire collection in the possession of the Medical Library cannot be distributed However, the Library does publish a bimonthly list of books it currently receives, and this publication is sent to any borrower at his request

The Library offers invaluable facilities to the medical, dental, nursing, and allied professions, as well as to governmental agencies Doctors, dentists, nurses, public health officers, and professional persons may borrow books The Library also loans to hospitals, medical colleges, libraries, laboratories, and similar institutions throughout the State

All requests should be addressed to the New York State Medical Library, Albany 1, New York As many as ten books may be borrowed at one time by individuals Institutional loans are limited to 25 volumes Books and bound journals may be kept for four weeks Unbound periodicals of the current year are loaned for a period of two weeks The material is sent by parcel post, and the borrower is responsible for only the return postage

If a subject is requested, the Library will send either a selection of literature or a bibliography of material, according to the borrower's request

The bimonthly lists of current material received in the Library are also available upon request

The Medical Library is a part of the New York State Library, which houses over two million books, pamphlets, and manuscripts The services of the entire Library, under the supervision of Dr Charles F Gosnell, State Librarian, are available to all residents of the State There is a general reference section, law library, legislative reference section, manuscripts section, library for the blind, and an extension division

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PUT YOUR WIFE IN BUSINESS

Police in Georgetown, South Carolina, posted the following notice "A Poser for Boozers If you are a married man who absolutely must drink booze, start a saloon in your own home Be the only customer, and you won't have to buy a license. Give your wife $2 to buy a gallon of whiskey There are sixty-nine glasses in a gallon. Buy your drinks from your wife When the first gallon is gone, your wife will have $8 to put in the bank, and $2 to start over in business again If you live ten years, continue to buy all your booze from your wife and then die with snakes in your boots, your widow will have enough to bury you respectably, bring up your children, buy a house and lot, marry a decent man, and forget all about you"

—*J.A M A , April 17, 1948*

Case Reports

ERYTHEMA MULTIFORME BULLOSA (STEVENS JOHNSON TYPE)

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(From the Pediatric Service Harlem Hospital)

IN 1866, von Hebra described a symptom complex consisting of stomatitis conjunctivitis and an erythematous-like rash as erythema exsudativum multiforme.[1] Stevens and Johnson in 1922 reported two such cases resulting in blindness and regarded their cases as a distinct clinical syndrome.[2] However from Fletcher and Harris communication it seems that all the previous cases noted were variations of Hebra s original syndrome [3]

Erythema multiforme bullosa is a febrile, eruptive toxic disease having a multiplicity of skin lesions varying from macules to vesicles and involving the mucous membranes of the eye mouth, genitalia, and rectum. The vesicular elements may become pseudomembraneous with necrosis and ulceration Corneal scars, symblepharon and blindness are reported.[4,5] The lesions crust and heal in three to six weeks. The cause is obscure although Staphylococcus aureus is frequently cultured from the lesions. Allergic phenomena and viral agents have also been incriminated.

Case Report

J H., a 15-month-old Negro boy, was admitted to the pediatric service for a rash and fever of five days duration. The rash consisted of many 'blisters' on a red base which had started on the lower extremities and continued to spread up to the umbilical region. Four days prior to admission, the patient had been treated at the skin clinic, but because lesions continued to spread, the patient was hospitalized There was no familial history of any allergies. The child had no history of any drug ingestion food allergies, or other idiosyncracies.

Examination on admission revealed a well developed, Negro boy appearing acutely ill and highly irritable with a temperature of 101 F A moist, pruritic, erythematous, pustular rash was present on both lower extremities, whereas the trunk had many erythematous, papulovesicular lesions. The penis upper extremities face, neck, and mucous membranes of the eyes and the mouth were free of lesions. The rest of the physical examination was essentially normal

Laboratory data at the time of admission were as follows The hemogram showed hemoglobin 82 per cent 4,000 000 erythrocytes 30 000 leukocytes 70 per cent polymorphonuclears 27 per cent lymphocytes, 2 per cent eosinophils and 1 per cent basophils. Blood culture nose and throat culture Kahn test, urinalysis and the Mantoux test in a 1 10 000 dilution were all negative. Culture of the vesicular contents resulted in the growth of many colonies of S aureus (coagulase positive) and Streptococcus gamma.

The impression on admission was toxic dermatitis with multiform lesions probably secondarily infected. A dermatologic consultant agreed with this tentative diagnosis.

Treatment consisted of penicillin 10 000 units intramuscularly every three hours and wet dressings of Burow's solution in a 1 20 dilution locally for the extremities while calamine lotion was applied to the lesions on the trunk. The child became afebrile on the third hospital day and showed marked clinical improvement Penicillin was discontinued, but the local treatment was maintained. This afebrile period lasted three days

The old skin lesions regressed but new crops of vesicles and bullae began to appear on the upper extremities and face On the sixth hospital day, the child again became acutely ill with a temperature of 105 F Vesicles and bullae were noted on the lips and buccal mucosa. The penis, especially at the meatal margins, was covered with vesicles. Lacrimation epiphora, and injected conjunctivae were the outstanding eye findings. The diagnosis of erythema multiforme bullosa was then made. Therapy consisted of intramuscular injections of penicillin 30 000 units every three hours, while Burow's solution and calamine lotion were applied locally on the skin lesions. Mouth rinsings with diluted hydrogen peroxide were performed several times daily The eyes were irrigated with simple boric acid solution

The oral lesions became confluent finally breaking down with the production of a fetid bloody profuse discharge Necrotic areas on the buccal mucosa and lips were covered with slimy gray pseudomembranes. The tongue swelled so enormously that a tracheotomy set was kept prepared for emergency During this difficult period constant aspiration of the oral contents was necessary Nutrition was maintained by a high caloric fluid diet. The penile lesions broke down, resulting in a balanitis with a thin exudate involving the meatal margins. The urethra, however remained patent.

Occasional starch and oatmeal baths were given to alleviate the pruritis Penicillin ointment 500 units per Gm was applied to the right side of the face while calamine lotion was continued on the left side. No differences in the rate of healing were noted. On the twelfth hospital day, it was evident that the spread of the disease had halted and that regression was taking place No new vesicles appeared, whereas the old ones became encrusted. The scabs fell off, leaving no scars or pigmented areas. A hemogram on the twelfth hospital day revealed hemoglobin 79 per cent erythrocytes 4 200 000 leukocytes 15 000, polymorphonuclears, 70 per cent lymphocytes 26 per cent monocytes 2 per cent, and eosinophils, 2 per cent. On the fourteenth hospital day the temperature returned to normal and the patient remained afebrile until discharge

Normal mucosa began to fill in the necrotic areas in and about the mouth, causing the slimy membranes to be sloughed off The tongue gradually returned to its normal dimensions The penile lesions followed a course somewhat between the oral and skin lesions All lesions disappeared on the twenty-eighth hospital day, and the patient was discharged cured on the thirtieth hospital day

Comment

The child on admission had lesions suggesting erythema multiforme but no other findings to suggest a Stevens-Johnson syndrome This is especially true since most of the lesions discernible were of a pustular nature and had not involved the mucous membranes Due to the pyogenic organisms present in the pustular and vesicular elements, penicillin was considered the medicament of choice

Although a clinical response was obtained with a three-day period of apparent remission, the spread of the lesions could not be checked On the sixth hospital day the typical Stevens-Johnson syndrome became evident Penicillin was again administered [6]

It is difficult to evaluate the effects of penicillin therapy We feel that penicillin prevented virulent secondary invaders from taking foothold in the already devitalized necrotic tissues Penicillin may have shortened the course of the disease, but of this there is no proof It is also felt that the penicillin was instrumental in preventing severe eye lesions because the panophthalmitis in reported cases may have resulted from secondary infections

Interestingly enough, the use of penicillin ointment had no greater advantages over the ordinary Burow's solution or calamine lotion The severe stomatitis, cheilitis, and lingual edema caused great concern in view of the several respiratory deaths reported [7] Eosinophilia was not notable in this patient during the course of the disease [8]

References

1 von Hebra, F On Diseases of the Skin (Translated and Edited by C H Fagge) London New Sydenham Society 1866, vol 1
2 Stevens A M and Johnson F C Am. J Dis. Child 24 526 (1922)
3 Fletcher M W C and Harris, R. C J Pediat. 27 465 (1945)
4. Bailey J H Arch Ophth. 6 362 (1931)
5 Rutherford, C W Paper read before A.M A Section on Ophthalmology July 12 1929
6 Goldfarb, A A J Pediat 28 579 (1946)
7 Stanyon, J H , and Warner W P Canad. M A. J 3 111 (1946)
8 Murphy R C Jr New England J Med 230 69 (1944)

TO STUDY OCCUPATIONAL CANCER HAZARDS

The United States Public Health Service has announced that it has set up a special section of the National Cancer Institute for the study of occupational cancer hazards

Dr W C Heuper, who will direct the work, is with the Warner Institute for Therapeutic Research in New York

"It seems clear that part of the increased incidence of cancer is linked to the growth of industry during the past 100 years and to the dangers of prolonged exposure to certain substances," Dr Heuper said

"Certain chemical substances have been suspected of causing cancer ever since the end of the eighteenth century when a British physician first noticed the high incidence of skin cancer among London's chimney sweeps," he added

"A number of chemicals have been definitely shown to cause cancer in mice and other experimental animals More recently, we have learned to protect workers handling radioactive materials, x-ray equipment, and certain carcinogenic chemicals, from the dangers of cancer and other harmful effects"

A negative chest x-ray today is valid only today, chest roentgenography should be universal and periodic —*Exchange*

Sometimes renal tuberculosis is without symptoms, and the only finding is a slight pyuria containing tubercle bacilli —*Exchange*

THE MANAGEMENT OF DIABETES COMPLICATED BY TUBERCULOSIS

MORRIS ANT M.D and ROBERT A LOVE, M D , Brooklyn New York
(*From the Kings County Hospital*)

IT HAS long been known that diabetic patients are especially susceptible to tuberculosis The regime of therapy when the two diseases coexist in one person requires more special consideration than if treated separately in different individuals, since they produce new and weighty problems. According to surveys over many years tuberculosis occurs four times more often in diabetic patients than in non-diabetics.[1] Tuberculosis, because it may affect many gland organs such as the liver or adrenals, by miliary involvement and fibrosis, interferes with the normal sugar metabolism, thus becoming a factor in the causation of diabetes This was pointed out by Murray and Morgan in their experiments on carbohydrate metabolism in ascorbic acid-deficient guinea pigs under normal and anoxic conditions.[2] They reported that ascorbic acid-deficient animals had significantly higher blood sugars and probably significantly lower liver and carcass glycogen. The intestinal absorption of the sugar, the authors continue is less complete in the vitamin C-deficient animals, and they reason that tuberculosis reduces ascorbic acid metabolism.

Because of the large involvement and proliferation of the connective tissues pulmonary fibrosis may interfere with the oxygen exchange and thus aggravate a condition such as diabetes. This is aggravated by concomitant pleural thickening

In their experiments on rats Hove Hickman and Harris found that when the animals were placed on a diet in which part of the carbohydrates were replaced by fat they presumably had a greater oxygen requirement because the respiratory quotient was lower.[3] They stated that this lower respiratory quotient was reflected in the fact that the rats on the low fat diets survived for a longer time than those on the high fat diets and that there is an increased resistance to anoxia at high levels of tocopherol if the amount of fat in the diet is low

Billimoria and Jacoby observed that chronic fibrotic forms of tuberculosis have a poor sugar tolerance and their blood sugar curves are diabetic in type.[4] On the other hand those with exudative ulcerative, pulmonary tuberculosis seem to have a high sugar tolerance and the descending limb of the curve is not diabetic in character

Banyai and Cadden point out that vitamin A deficiency may predispose diabetics to tuberculosis.[5] Lack of vitamin A causes definite pathologic changes in the mucosa of the respiratory system thereby increasing the opportunity for bacteria to enter the lungs and bronchial tissues. These authors feel that the administration of large doses of vitamin A serves as a useful supplemental therapy in the management of diabetes mellitus complicated by pulmonary tuberculosis.

In an article on tuberculous diabetics P Melvin Jr., and H. T Englehardt report that in nearly 50 per cent of these cases cavities occur and cascations develop very rapidly.[6] They observed x rays which showed 'a typical butterfly' type of lesion—a soft exudative process spreading peripherally from the hilus Pleural adhesions are more common Diabetics who develop coma are more apt to have tuberculosis.' It has been reported by several authors that cavitation is more frequent when pulmonary tuberculosis is complicated by diabetes.

The case here presented shows that when the diabetes complicated by tuberculosis was properly controlled, the condition of the tuberculosis improved speeding ambulation

Case Report

The patient, a 34-year-old poorly developed, poorly nourished white man gave a history of diabetes for the past twelve years For the last four to five years he was taking 60 to 70 units of protamine zinc insulin each morning In September of 1945 an x ray showed a soft, exudative tuberculosis of the upper two thirds of the left lung and the right first interspace. He was admitted to Kings County Hospital with a diagnosis of a moderately advanced pulmonary tuberculosis. He was treated with a 2 500 calorie diet 65 units of protamine zinc insulin daily and pneumothorax. Between January 16 1946 and his discharge on March 4 1946 he received 12 pneumothorax refills

While in the hospital his urine was almost continuously on a 3 to 4 plus level despite blood sugar levels during control periods on several occasions of 100 to 144 mg. per cent. After discharge the patient was sent to a sanitarium in Colorado for rest and continuation of his pneumothorax. While he was in Colorado his diabetic condition was treated on the basis of covering his glycosuria with insulin He had several insulin reactions resulting in a flare-up and loss of control of his diabetic condition As a result the tuberculosis could not be properly treated To make things worse he developed diarrhea. He was then sent back to Kings County Hospital for treatment of the diabetic condition

On readmission, he pleaded with the resident not to treat him with routine insulin coverage because, as he explained, 'I can go into insulin shock even with a 4 plus sugar in my urine. No doubt this was due to a low sugar tolerance and a disturbed renal threshold which in our opinion was induced by the continuous use of protamine zinc insulin

Physical examination of the lungs revealed dullness to percussion in the left upper and left lower lobes. The breath sounds were decreased over the whole left lung field anteriorly and posteriorly There were moist crackling rales over the left upper lobe, and vocal fremitus was decreased over the entire lung The heart was not enlarged. The rhythm was regular and A_2 was greater than P_2 Examination of the extremities revealed the left arm flexed 45 degrees at the elbow and 90 degrees at the wrist with ulnar deviation of the fingers His past history revealed that his left arm had been paralyzed since birth His blood pressure was 110/70 temperature 98 6 F pulse 92 and respirations 20.

It had been planned to transfer the patient to a tuberculosis sanitarium, but because he feared going to a sanitarium where the diabetic control might again be lost he asked to stay at the hospital

He was put on a routine which was not based on a haphazard coverage of urine glucose alone but rather consisted of, (1) establishing a fixed diet—200 Gm carbohydrate, 75 Gm protein, and 70 Gm fat, the diet being of a high calcium content, (2) removing protamine zinc insulin from the therapy, and (3) replacing it with crystalline zinc insulin, 30 units three times daily He continued on this dosage about two weeks when he began showing insulin reactions for three consecutive nights The insulin was cut, first to 30 units morning and noon and 20 units at night, and slowly reduced until, two weeks before discharge, he was stabilized on the same diet and 25 units in the morning and 20 units at night of crystalline zinc insulin His diarrhea slowly diminished He was permitted ambulation

During his hospital stay, the patient's appetite improved, and he gained weight The sputum became negative, gastric washings for tubercle bacilli were negative The lungs became free of rales, breath sounds improved, but dullness throughout the left lung persisted His entire physical condition showed improvement His diarrhea stopped, and subsequent x-rays of the lungs showed suggestions of improvement of the lung pathology Discontinuation of the pneumothorax was advised because of its ineffectiveness, and he was kept for a while on complete bed rest until his diabetic status was controlled

Discussion

Walther and Ammon feel that injections of small amounts of foreign protein, of which protamine is one, over a number of years cannot be disregarded as deleterious unless further studies are made [6] They are of the opinion that permanent injections of foreign protein may produce late injuries, especially to the vascular system We found, particularly in our case, that protamine zinc insulin was one of the offenders of the proper physiologic actions of the kidney and acted as a foreign protein It, therefore, interfered with an already disturbed metabolism of the lungs, thus creating a vicious cycle by prolonging the active stage of tuberculosis and reversibly creating a more severe diabetes

Sindoni cites a case of a 33-year-old man who had diabetes associated with pulmonary tuberculosis for eighteen years [7] The patient was admitted to the hospital in a comatose condition after having been found unconscious on a vacant lot Prior to the accident, his dosage had been 15 units of plain and 18 units of protamine insulin for breakfast and 10 units of plain insulin for supper At the time of hospital admission, his blood sugar was 52 mg , and the carbon dioxide combining power of the blood plasma was 40 mg In spite of therapy he never regained consciousness and died five days after admission

A paper to be published by one of us (M A) discusses the toxic effects of the prolonged use of protamine zinc insulin When a patient uses protamine zinc insulin over a long period of time, there is evidence of facial puffiness, thickened lid and lid margins, increased blood cholesterol, creatinine, and uric acid, a disproportion between the blood and urinary sugar, and a low blood sugar, despite a high urinary sugar, simulating a renal diabetes However, when the medication was changed to crystalline zinc insulin, the symptoms disappeared, and the sugar tolerance, both for the blood and kidney, increased These factors indicate a damage to the permeability of the tubules and the sugar filtration mechanism.

Many unfavorable reactions by protamine zinc insulin are reported by Sindoni, including blurred vision, loss of appetite, frequent headaches, weakness in the legs, slight to extremely marked fatigue, increased irritability, lapse of memory, morning nausea and vomiting, and vertigo [7] He points out, in relation to the case cited above, that patients having low blood sugar levels over long periods and at irregular intervals may slowly or suddenly show evidence of permanent cerebral damage due to these low blood sugar levels

In the case which we have presented, the continuation of pneumothorax refills, both in the hospital during his first admission and then during his stay in Colorado, proved of no aid in controlling the tuberculosis, and complete bed rest was instituted as the therapy of choice Since it is known that pneumothorax is an accepted and successful method, the failure of this treatment in this particular patient must be attributed to poor diabetic control

Banyai and Cadden emphasize the fact that since empyema very frequently complicates artificial pneumothorax in patients with exudative and caseous tuberculous lesions of recent origin, the institution of this type of therapy should be handled with caution in the diabetic tuberculous patients [1]

With the incidence of tuberculosis being of such a high rate in diabetic patients, it is extremely important that all diabetic individuals be x-rayed for chest pathology

Summary

1 Some of the reasons for the diabetic patient's predisposition to tuberculosis are given

2 A case of tuberculosis complicated by juvenile diabetes mellitus is described

3 If the diabetic condition is properly controlled, the condition of tuberculosis is improved

4 Protamine zinc insulin is considered to be contraindicated in diabetics suffering from tuberculosis

5 Insulin coverage should not be based on urinary glucose findings at irregular intervals but should be calculated on a twenty-four-hour metabolic requirement

6 Contraindications to collapse therapy in tuberculosis complicated by diabetes are discussed.

7 Proper diabetic care and control will lessen hospital stay and reduce sanitarial care

References

1 Banyai Andrew L. and Cadden Anthony V Arch. Int Med. 74 445 (Dec) 1944

2 Murray Hazel C and Morgan Agnes Fay J Biol Chem. 163 401 (May) 1946

3 Hove E L Hickman K. and Harris Philip L. Arch. Biochem. 8 395 (Dec) 1945

4 Billimoria R B and Jacoby H Indian M Gaz 80 6 (1945)

5 Melvin P Jr and Englehardt, H T South. M J 39 64 (Jan) 1946

6 Walther G and Ammon R. Klin. Wchnschr 18 288 (Feb 25) 1939

7 Sindoni Anthony Jr Delaware State M J 18 21 (Feb) 1946

8. D Angelo Savino Am. J Physiol 145 365 (Jan 1) 1946

9 Peck William M and Willis Henry Stuart Am. Rev Tuberc. 52 15 (July) 1945

DIVERTICULITIS OF THE RECTOSIGMOID WITH ACUTE OBSTRUCTION CAUSED BY ASSOCIATED INTUSSUSCEPTION

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(From the New York Post-Graduate Medical School and Hospital)

DIVERTICULITIS of the colon causing acute obstruction is not common. In association with intussusception it must be rare In the following case the diagnosis could not be made with certainty until the diseased area was excised and inspected at the time of operation As a result the remaining portion of rectum (7 cm.) was spared and a satisfactory anastomosis was performed

Case Report

M O , a 72-year-old white man, was admitted to the hospital on August 9, 1947, with a five-day history of abdominal cramps nausea, and obstipation There was a past history of bowel irregularity for several years. Dysuria and nocturia due to a hypertrophied prostate had been present during the preceding five years. Examination revealed an acutely ill patient with distension visible peristalsis and a metallic tinkle on auscultation of the abdomen A scout film of the abdomen showed markedly distended loops of bowel including the descending colon (Fig. 1) After adequate preparation including the use of a Miller Abbott tube and parenteral therapy an operation for intestinal obstruction was performed. This consisted of transverse colostomy without exploration of the abdominal cavity done with 1 per cent procaine by infiltration for anesthesia. The postoperative course was satisfactory complicated only by urinary retention requiring a Foley catheter

On August 15 1947, a barium enema revealed slight narrowing at the rectosigmoid region with diverticulosis of the sigmoid colon (Fig. 2) On August 20, 1947 sigmoidoscopy was attempted It was difficult to pass the instrument beyond six inches because of the patient s discomfort At this point the mucosa appeared congested, and the lumen could not be discerned Saline washings from the rectum were taken for cytologic examination which proved negative for tumor cells. An incidental finding at the time was a rectal polyp 1 cm. in diameter, which was removed The patient was discharged from the hospital under continued observation. The colostomy was functioning well while the urinary symptoms were unimproved.

On September 4, 1947 after two attempts to repeat the barium enema a trickle of the solution passed beyond a markedly constricted area in the



FIG 1 Scout film of the abdomen showing distended loops of colon



FIG 2. First barium enema. Lateral view showing diverticulosis of the sigmoid with some narrowing at the rectosigmoid region.

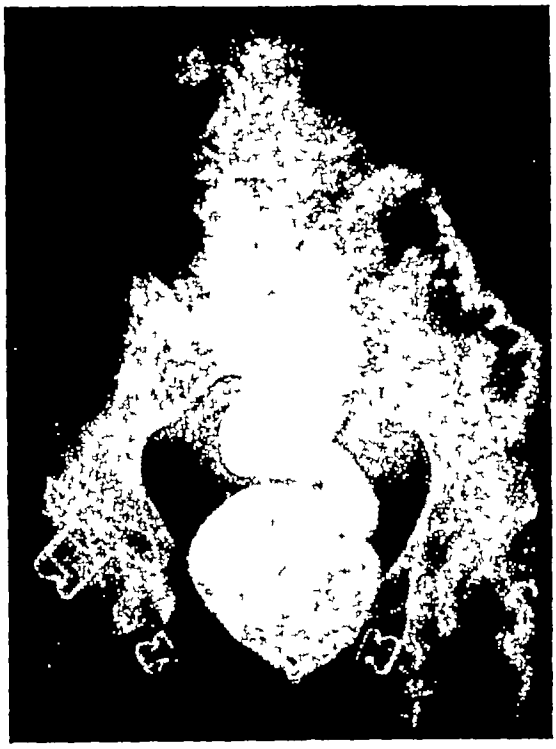


FIG 3 Barium enema, nineteen days later Anteroposterior view showing marked narrowing at the rectosigmoid region permitting only a trickle of dye to pass proximally into the colon (The four circular dense areas are metal buttons on a colostomy bag)

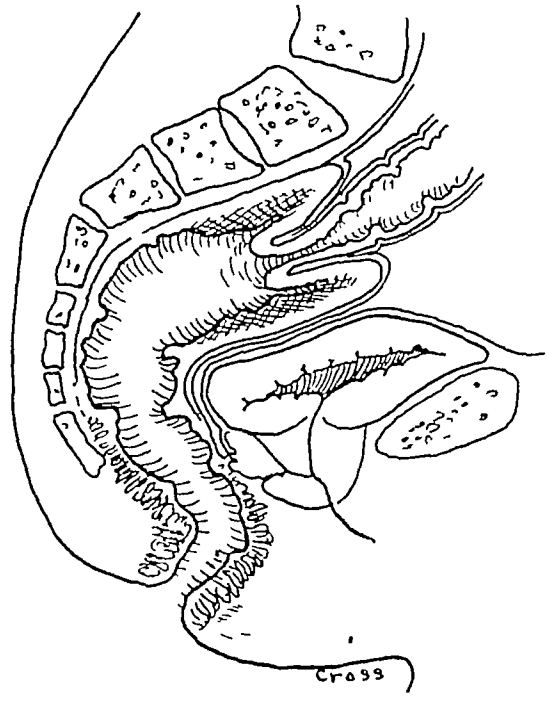


FIG 4 Diagrammatic representation of the pathology found at operation

rectosigmoid (Fig 3) Because of the marked narrowing occurring during a nineteen day interval between x-ray studies, exploration was decided upon in order to rule out carcinoma.

The patient was readmitted to the hospital, and on September 10, 1947, under gas-oxygen-ether anesthesia, operation was performed At the brim of the pelvis and extending inferiorly there was a firm, obstructing mass involving the rectosigmoid and densely adherent to a distended urinary bladder The mass with adjacent sigmoid and upper rectum was mobilized and excised for immediate examination This revealed a rectosigmoid with intact mucosa and markedly thickened walls and a sigmoid intussusception, causing almost complete obstruction The remaining lumen was a fraction of a centimeter in diameter (Fig 4) A two-layer, open primary anastomosis was performed, and the infraperitoneal area was drained The pathologic report was as follows

Gross examination reveals that the segment measures 17 3 cm in length The proximal two thirds shows well-demarcated taenia The distal 5 5 cm shows markedly congested serosa adjacent to a ragged indurated serosal tear 3 by 2 cm The latter reveals a thick fibrotic subserosa on section The mucosa is folded and along the mesenteric attachment reveals pouches of diverticula spaced at intervals of about 2 cm Within the indurated area, the diverticula have wide mouths and fibrous bases On section the diverticula are free of foreign material Scattered throughout the mucosa are several lenticular nodules ranging from 2 to 4 mm. in diameter

Microscopic examination shows each diverticulum with an intact mucosa and submucosa invaginating into the muscular coats The latter are thinned, and their adjacent subserosa is broad and densely fibrous' A larger artery and vein lie opposite each pouch In the region of the constriction are several diverticula whose muscularis and subserosa are replaced by dense fibrous tissue severely infiltrated with an exudate of neutrophils, plasma cells, and multinucleated foreign body giant cells The polypoid mass is described by areas of submucosal edema and congestion with hyperplastic lymphoid follicles The overlying glandular epithelium is intact The tissue removed from the bladder wall consists of thick, necrotic fibrous and granulation tissue filled with the exudate described Large nests of foreign body giant cells are also noted in this In all sections, no evidence of malignant change is noted

The diagnosis was diverticulosis and chronic diverticulitis of colon

The postoperative course was good, and on September 30, 1947, an intraperitoneal closure of the transverse colostomy was performed The urinary symptoms improved On October 7, 1947, the patient was discharged from the hospital and several weeks later returned to work in good health

COEXISTENCE OF THE WOLFF PARKINSON WHITE SYNDROME AND ORGANIC HEART DISEASE

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IN 1940 Hunter Papp and Parkinson brought the literature up to date by collecting 109 cases of the Wolff Parkinson-White syndrome.[1] This syndrome was associated with organic heart disease in 21 of these cases an incidence of 19 per cent As to the cause of the concomitant cardiac lesions they listed hypertension mitral stenosis aortic insufficiency (syphilitic and rheumatic) and coronary thrombosis but they failed to state the total number of cases for each etiologic type

Our interest in this subject was stimulated by a study in which the limitations of the electrocardiogram in the diagnosis of acute myocardial infarction in the presence of the syndrome of short P R interval and prolonged QRS complex were pointed out [2] Briefly, the essential criteria even in the presence of organic heart disease which establish the diagnosis of the Wolff Parkinson-White syndrome are as follows a P R interval of 0 10 second or less, a QRS complex of 0 10 second or more and slurring of the initial ventricular deflection in the first or second lead The object of the present report is to review the literature in detail with respect to the incidence of the various etiologic types of organic heart disease when associated with the Wolff Parkinson White syndrome and to add another case which illustrates this coexistence

Case Report

H B a 56-year-old white man was admitted to the hospital on April 23 1942, because of substernal pain of fourteen hours duration which was severe enough to wake him from his sleep The pain radiated through the chest to the back. He was covered with a cold sweat and had a fear of impending death. He was given 0 015 Gm. morphine sulfate subcutaneously by his physician with some relief of pain but this was followed by vomiting He had been a known hypertensive for three years

The physical examination revealed a rectal temperature of 98.6 F The patient was under nourished and appeared acutely ill There was no dyspnea or orthopnea. The neck veins were not distended in the erect position The heart sounds were poor, with the point of maximum impulse in the fifth intercostal space at the anterior axillary line. There were no thrills or murmurs The pulse rate equaled the ventricular rate and was 78 beats per minute. The blood pressure was 148/104 There was no enlargement of the liver or spleen and no peripheral edema

Pertinent laboratory data on admission included a white blood count of 12 100 cells per cu mm with 87 per cent neutrophils and a blood sedimentation rate of 10 mm at the end of forty five minutes.

The patient was asymptomatic throughout his hospital stay His course is outlined in Figure 1 The temperature rose to 101 4 F by the fifth hospital day and then fell gradually to normal by the seventeenth day The blood pressure fell to 118/74 on the second day It then varied between 118 to 142 systolic and 66 to 80 diastolic until discharge when a pressure of 104/90 was recorded The white blood count and neutrophils were at their peak on admission and subsequently fell to within normal range. The blood sedimentation rate climbed to 62 mm. at the end of forty five minutes by the twelfth hospital day and declined to 20 mm. in forty five minutes on the thirty-seventh day

The clinical picture was that of an acute myocardial infarction in a patient with hypertensive and arteriosclerotic heart disease. The electrocardiograms (Fig. 2 *A B C, D* and *E*) showed the short P R interval and prolonged QRS complex pathognomonic of the Wolff Parkinson-White sydrome

The patient was discharged on the forty third hospital day and has been followed in the cardiac clinic

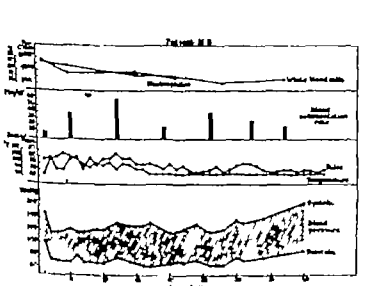


FIG 1 Chart outlining course in hospital

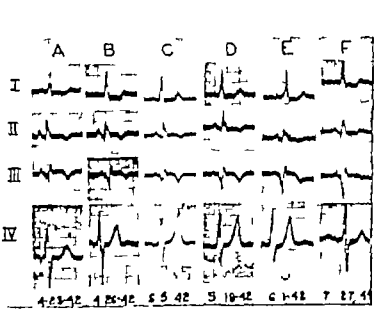


FIG 2 Electrocardiograms taken during period of hospitalization (*A* to *E*) Shortened P R interval (0 10 second or less) and prolonged QRS complex (0 10 to 0 12 second) are seen Note minor changes in T_1 from diphasic (*A B*) to upright (*C D*) and then diphasic again (*E*) Electrocardiogram taken two years later (*F*) Note similarity to previous tracings

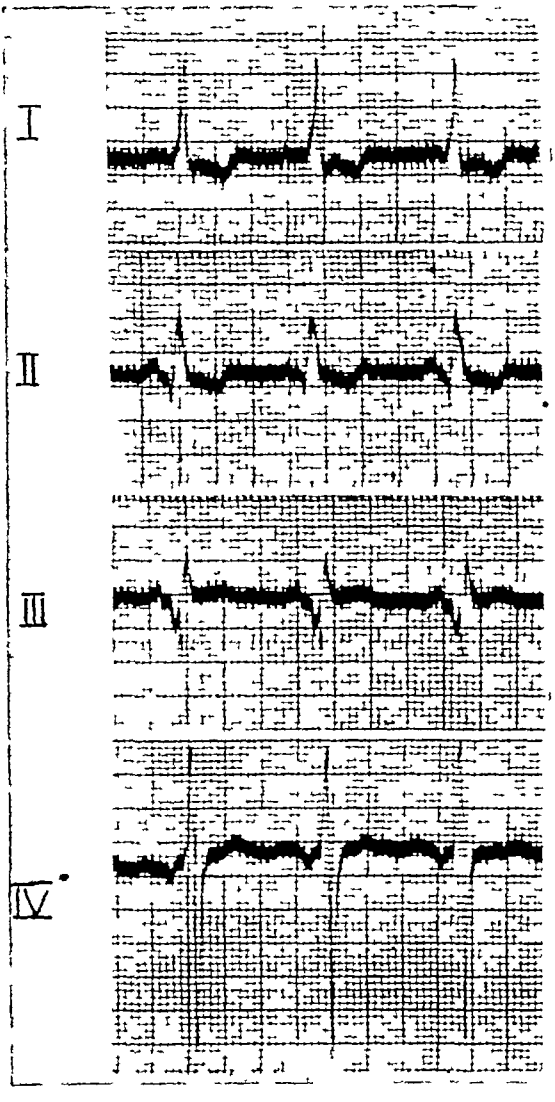


FIG 3 Electrocardiogram taken four years after acute myocardial infarction Short P-R interval and prolonged QRS complex persist

since He has had no chest pain to date By the end of 1942, his blood pressure had risen to 230/120 and has persisted at this level Electrocardiograms taken in 1944 (Fig 2 *F*) and in 1946 (Fig 3) still showed a short P-R interval and prolonged QRS complex

Discussion

This case appears to be similar to the 38 cases previously reported in which organic heart disease and the Wolff-Parkinson-White syndrome were associated The classification of the heart disease in these 39 patients (Table 1) was as follows congenital, one case, rheumatic, 14 cases, arteriosclerosis, 12 cases (8 with coronary artery disease and 4 with coronary thrombosis), hypertension, nine cases, and thyrotoxicosis, two cases

Two facts are worthy of emphasis The first is that the syndrome of short P-R interval with prolonged QRS complex may be discovered at any age It has been reported in individuals as young as fourteen weeks of age and as old as the seventies [17 18] The second is that, although this syndrome is found in association with heart disease of almost every cause, it is still more common in patients without organic heart disease One is, therefore, led to believe that the occurrence of the Wolff-Parkinson-White syndrome depends for its existence on the functioning of an anatomic pathway known as the Bundle of Kent, and that its association with organic heart disease represents an accidental circumstance [19 20]

There is a practical application of the recognition of this association in the treatment of organic heart disease Patients with the Wolff-Parkinson-White syndrome are especially prone to paroxysms of rapid supraventricular rhythms In the normal heart this may be of little or no consequence, but it is known that in the diseased heart, circulatory complications as serious as congestive heart failure or even death may result from a paroxysmal rapid rhythm [21 22] One of our patients had bouts of rapid auricular fibrillation associated with pain in the chest and shortness of breath of such frequency and duration that he became almost totally incapacitated [2] The paroxysmal arrhythmia was finally

TABLE 1 —ETIOLOGY OF HEART DISEASE IN CASES ASSOCIATED WITH WOLFF-PARKINSON-WHITE SYNDROME

Authors	Congenital	Rheumatic	Arteriosclerotic Coronary Sclerosis	Arteriosclerotic Coronary Thrombosis	Hypertensive	Luetic	Thyrotoxic
Hunter Papp and Parkinson[1]		2			1		1
Rinzler and Travell[2]				1			
Wolff Parkinson and White[3]			1		1		
Wolferth and Wood[4]		1					
Fulchiero[5]			1			1	
Cossio Berconsky and Kreutzer[6]		1			1		
Holzmann[7]		1					
Fernbach[8]		1					
von Gruber[9]					1		
Hartog[10]		1					
Fischer[11]				1			
Katz and Kaplan[12]			1				
Sibilia[13]			1				
Hervé, Besoain and Fuenzalida[14]					1		
Aixala[15]		2					
Goldbloom and Dumanis[16]				1			
Bodlander[17]	1						
Willius and Carryer[18]		5	4		4		1
Rinzler				1			
Total	1	14	8	4	9	1	2

completely controlled by 1 8 Gm daily of quinidine sulfate orally and the patient was able to return to his job as a salesman There has been no recurrence of the arrhythmia in the ensuing six month period of observation

Summary

1 A case illustrating the association of the Wolff Parkinson-White syndrome and acute myocardial infarction is reported

2. The literature relating to the coexistence of the syndrome with organic heart disease is reviewed

3. The clinical importance of the knowledge of the association of the two conditions in relation to paroxysms of rapid rhythm is stressed

References

1 Hunter, A Papp C., and Parkinson, J : Brit Heart J 2: 107 (1940)
2. Rinzler S H., and Travell, J Am J Med 3: 106 (1947)
3. Wolff L. Parkinson J., and White P D Am Heart J 5: 685 (1930)
4. Wolferth C. C., and Wood F C Am Heart J 8 297 (1933)
5. Fulchiero, A : Minerva med 26: 310 (1935)
6. Cossio P., Bercovsky I and Kretzer R R argent. de cardiol 2 411 (1936)
7 Holzmann, M : Arch. f Kreislaufforsch. 1: 2 (1937)
8. Fernbach, J : Orvosi hetil 81: 377 (1937)
9 von Gruber Z Zschr f Kreislaufforsch. 30: 100 (1938)
10. Hartog, H. A P Nederl. tijdschr v geneesk 82 5112 (1938)
11 Fischer, R Arch. d. mal du coeur 31: 907 (1938)
12. Katz L. N and Kaplan, L. G : Am. Heart J 16 694 (1938)
13. Sibilia, D : Cuore e circolaz 25 112 (1941)
14. Hervé L. Bessain, M. and Fuenzalida, O R méd. de Chile 70 270 (1942)
15 Aixala R.: Rev cubana de cardiol 4 61 (1943)
16. Goldbloom, A. A. and Dumanis, A. A. Ann. Int Med 25: 302 (1946)
17 Bedlander J W : Am. Heart J 31: 785 (1946)
18. Willius F A., and Carryer H M Proc Staff Meet Mayo. Clin. 21: 438 (1946)
19 Kent, A. F, S.: J Physiol 48: 57 (1914)
20. Wood, F C. and Wolferth C. C Am. Heart J 25: 484 (1943)
21 Wolff L.: New England J. Med. 226: 640 (1942)
22. Grant, R. F : Am. Heart J 33: 121 (1947)

MYELOGENOUS LEUKEMIA RESULTING FROM BENZOL POISONING

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BENZOL (benzene) has been known to cause fatal aplastic anemia since Santesson's description in 1897 of four cases of workers in a bicycle tire factory and since then the classical picture of leukopenia, anemia, and thrombocytopenia represents only the severe form of benzol poisoning Pathologically it has been explained that benzol brings about a progressive degeneration of blood-forming bone marrow with subsequent disappearing of red blood cells, granulocytes, and thrombocytes from the peripheral blood stream. In 1912 Korenyi was the first to attempt the treatment of myelogenous leukemias with small doses of benzol based on the assumption that the latter was known to diminish the activity of the bone marrow His attempts met with little success due to the extreme toxicity of the drug and were later abandoned

In 1916 a confusing paper by Selling and Osgood was published followed with a report of six cases of leukemia noted in patients that had been previously exposed to benzol.[1] In 1928 Delore and Bergomano reported a case of myelogenous leukemia in a man who had previously spent five years extracting pyramidon with benzol [2] This was followed in 1932 by a report by Falconer of a case of lymphatic leukemia developing in a worker who had recently recovered from acute benzol poisoning [3] In 1933 Lignac who became extremely interested in the effects of benzol, injected 54 white mice with small doses of benzol and produced a true leukemic process in eight cases [4] Later in 1939, Frf and Rhoads reported nine cases of exposure to benzol.[5] Of these, eight developed the typical picture of an aplastic anemia with anemia leukopenia and thrombocytopenia followed by complete recovery The ninth case developed a white blood count of 130,000 and subsequently died with typical findings of myeloid leukemia proved by post mortem examination Also in 1939 Bondwich *et al* , made a very extensive study of benzol poisoning and its effect on the bone marrow and reported two cases of leukemia following exposure to benzol [6] They also showed that mild contact with benzol could produce a transitory leukocytosis in quite a few nonfatal cases

The conclusions drawn from these reports have been that generally long exposure to benzol results in the degeneration of the bone marrow producing an aplastic anemia. On the other hand in a few rare instances, benzol has done the opposite, namely stimulation of the bone marrow resulting in a true leukemic process

Case Report

A. P , a 44-year-old white man, was first seen on September 21 1947 with the chief complaint of epigastric pain. He was well until July 1946 when he first started having attacks of intermittent epigastric pain radiating to the right upper quadrant of his abdomen and to his back. These episodes of pain usually followed several hours after meals but on occasion had no connection with his food intake. Nausea without vomiting was the rule in all these seizures and on occasion the patient reported

bouts of diarrhea followed by even more severe pain Over a period of time he concluded that he could not tolerate citrus fruits and chocolate, since they were often associated with the attacks

During these fourteen months the patient saw several physicians who persistently treated him for peptic ulcer without appreciable relief He had gradually lost 30 pounds of weight since the onset of symptoms Finally, in May, 1947, patient had gallbladder and gastrointestinal x-ray series performed, and both x-rays revealed no pathology

His last severe attack was on September 21, 1947, when I was first consulted, and I advised hospitalization for work-up The interesting piece of history that I obtained at this time was that he had had almost continuous exposure to benzol and other solvents from October, 1942, until October, 1946

Physical examination revealed a fairly well-nourished white man in mild distress Temperature 98 6 F , pulse 84, blood pressure 112/70, respirations 20 per minute The skin had a yellowish pallor without rashes or purpura The eyes, ears, nose, and throat were normal The heart was normal in size, and there were no thrills or murmurs The lungs were clear on percussion and auscultation. The abdomen was soft and slightly tender in the right upper quadrant and epigastrium The liver was enlarged four fingers below the costal margin, and the spleen was palpable one finger below the costal margin No fluid or other masses were noted. In the lymphatic system there were two very hard, slightly tender, large nodes and also several hard and slightly enlarged inguinal nodes bilaterally No masses were found on rectal examination and the prostate was normal in size and consistency The extremities were normal, reflexes were physiologic bilaterally, and the Babinski sign was negative Barium enema was negative

Laboratory examination revealed the following data Urinalysis was negative except for traces of albumin Cephalin flocculation test was negative, as was the Kahn test The icterus index was 4 3 No blood or parasites were seen in the stool

A complete blood count on September 23, 1947, showed 4,550,000 red blood cells, hemoglobin 14 Gm , 53,850 white blood cells Table 1 shows the differential count

TABLE 1 RESULTS OF DIFFERENTIAL COUNTS

Leukocytes	Per Cent on September 23 1947	Per Cent on October 4 1947	Per Cent on October 17 1947
Polymorphonuclears	65		
Mature		15	18
Immature		28	23
Stab forms	11		
Metamyelocytes	5	15	20
Myelocytes	8	27	27
Eosinophils	2		
Eosinophilic meta myelocytes		3	4
Monocytes			2
Lymphocytes	8	11	7

For financial reasons, the patient insisted on being discharged and was followed at home after one week's hospitalization Treatment consisted of bed rest and increased vitamin and caloric intake

On October 4, 1947, a second blood count revealed a white cell count of 90,500, and on October 17, 1947, there were 3,800,000 red blood cells, 12 5 Gm of hemoglobin, and 128,500 white blood cells The differential counts for these dates are shown in Table 1

Conclusion

A case is presented of a man exposed continually to benzol for four years, developing, finally, a syndrome which was clinically typical of myelogenous leukemia with corroborative blood findings In view of the literature cited, there appears to be a strong correlation between the chronic exposure to benzol and the leukemic process developed in this otherwise normal white man

References

1 Selling L , and Osgood E Bull John Hopkins Hospital 17 81 (1916)
2 Delore P , and Bergomano, J J de med de Lyon 9 27 (1928)
3 Falconer, E Am. J M Sc. 186 353 (1933)
4 Lignac G Klin. Wchnschr 12 109 (1933)
5 Erf L and Rhoads C J Indust. Hyg & Toxicol 21 421 (1939)
6 Bondwich, M , Elkins H. Hunter F Mallory T Gall E and Brickley, W *ibid* 21 321 (1939)

DEATH RATE DOWN FOR "CATCHING DISEASES"

In spite of this being a big measles year, the combined death rate for the four chief "catching" diseases of children, measles included, reached a new low during the first quarter of the year, statisticians of the Metropolitan Life Insurance Company report

The death rate among the company's industrial policyholders for measles, scarlet fever, whooping cough, and diphtheria combined was 1 6 per 100,000 for the first three months of the year The rate for measles was only 0 6 per 100,000 A "truly remarkable" record has been established for tuberculosis so far this year, also The death rate from this disease for the first quarter of 1948 was 28 2 per 100,000 policyholders This is 13 per cent below the rate for the same three months last year and 25 per cent below the average for the same parts of the preceding five years

—*Science News letter, May 29, 1948*

LEIOMYOFIBROMA OF THE FALLOPIAN TUBE

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LEIOMYOFIBROMA of the fallopian tube is of such rarity and so few have been reported in the American literature that an instance of this benign tumor warrants its presentation Kelly and Cullen noted in 934 reports of leiomyofibromata of the uterus just one tubal myoma [1] Dietrich in his review in 1926 found but 39 [2] Since then 13 additional instances have been noted.[3–15]

Leiomyofibromata of the tube are usually single and small, although a tumor weighing 2 kg has been reported They may be subperitoneal interstitial or submucous. Tuberculosis has been described as a concomitant finding and torsion of the tube and ectopic gestation have been assigned to them. Grossly, they have been confused with adenomyomata and the nodules of salpingitis nodosa. Histologically they show the same structure and undergo the same changes as fibroids elsewhere

The tumor is discovered at operation and there are no specific diagnostic criteria which are different from those found with fibroids of the uterus

Case Report

Miss F P., age 40 was admitted to the Syracuse Memorial Hospital on September 8 1940, complaining of a mass in her abdomen She was known to have had a small fibroid in 1940 This was asymptomatic and the patient was examined at periodic intervals. During 1940 the tumor increased rapidly in size so that the patient could palpate the abdominal mass. She gave the history of having had her right tube and ovary removed for an ovarian cyst in 1938. An appendectomy was performed at the same time. In 1941 a cervical polyp was removed. The remaining history was noncontributory

A hysterectomy and left salpingo-oophorectomy and ovarian transplant were performed The uterus was studded with numerous large nodules In the isthmal portion of the left tube there was a firm circumscribed nodule having the typical appearance of the leiomyomata found in the uterus The postoperative course was uneventful

The pathology report was as follows "The specimen consists of a uterus, left tube, and a portion of a left ovary removed in supracervical hysterectomy The outer surface of uterus is red-yellow smooth and glistening and is irregularly enlarged due to the presence of several subserous myomata. The uterus measures approximately 9.5 by 6.5 by 11 cm. There are numerous thin adhesions on the outer surface. The interior of the uterine cavity has been opened bilaterally exposing a moderate amount of red-brown endometrium and a few small intramural myomata. In the proximal portion of the left tube and separate from the cornu there is a yellow nodule, extremely firm, occupying the lumen of tube and measuring 2.5 by 2 by 2 cm On cut section it is irregularly white and yellow and has the whorled appearance of a myoma. The myomata of the uterus are well encapsulated firm, irregularly white and yellow in color, and present the typical whorled appearance The ovary accompanying this specimen measures 4.5 by 3 5 by 2.5 cm., it is cystic and contains several corpora lutea in various stages of degeneration."

The microscopic description was as follows "The sections of the nodule in the tube have the characteristic cytology of a leiomyofibroma (Fig 1)

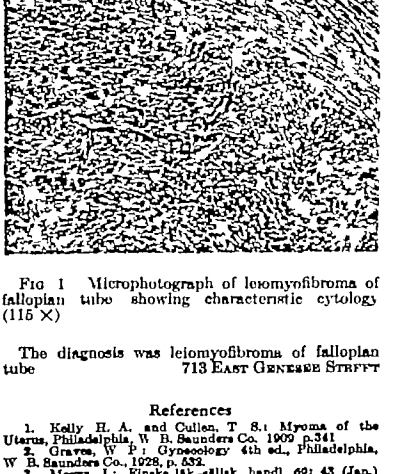


FIG 1 Microphotograph of leiomyofibroma of fallopian tube showing characteristic cytology (115 ×)

The diagnosis was leiomyofibroma of fallopian tube

713 EAST GENESEE STREET

References

1. Kelly H. A. and Cullen, T S.: Myoma of the Uterus, Philadelphia, W B. Saunders Co. 1909 p.341
2. Graves, W P.: Gynecology 4th ed., Philadelphia, W B. Saunders Co., 1928, p. 532.
3. Meyer J.: Finska läk.-sällsk. handl 69: 43 (Jan.) 1927
4. Percival, E.: Canad. M. A. J 21: 426 (1929)
5. Hoehloff A. W Zentralbl f Gynäk. 53: 1125 (1929)
6 Watkins, R. E.: Obstetrics and Gynecology Philadelphia, W B Saunders Co. 1933 vol 2 p. 1037
7 Farrer F Moore and Cambreleng, R. Uccla- Rev espan. de obstet. y ginec 3: 33 (July) 1945
8. Dutra, L. H.: An. brasil de ginec. 18: 275 (Sept.) 1944
9 Botaloro J Rev de gynec. e d obst. 1: 120 (Feb) 1941
10. Kopf H., and Fukas, M.: Zentralbl. f Gynäk. 62: 1552 (July 9) 1938.
11 Fasio, J M. and Emanuel A A. Semana med 1: 763 (Mar 11) 1937
12 Sehmisch, W.: Zentralbl f Gynäk 60 1200 (May 30) 1936
13 Pastorini, R.: Semana med. 2: 809 (Sept. 24) 1936
14 Costa, N Palcios, and Faesla, A.: Semana med 2 1214 (Oct. 24) 1935.
15 Cabot, H.: New England J Med 213 1249 (Dec 19) 1935.

CONGENITAL MALFORMATION OF THE ESOPHAGUS WITHOUT TRACHEO-ESOPHAGEAL FISTULA

JAMES R LISA, M D , and HELEN M TAYLOR, M D , New York City

CONGENITAL anomalies of the esophagus have, up to recent years, been mainly of pathologic interest and were considered incompatible with life Since surgical intervention now offers some hope, they have attained more general interest The majority of patients have fistulous tracts between the respiratory system and the esophagus, but a goodly number exist without this anomaly These latter instances are sufficiently unusual and present certain features so that the report of another case is warranted

Case Report

The patient, a boy, was born on January 25, 1946 The mother was a primipara admitted to the hospital in the seventh month of gestation The pregnancy had progressed normally to the fifth month, there had been only a slight albuminuria At this point, there occurred a rapid gain in weight with abdominal distention. There were no signs of toxemia, the blood pressure remained low and albuminuria had not increased Roentgenologic examination revealed no abnormalities of the fetal skeleton A diagnosis of hydramnios was made

The child was delivered normally and cried spontaneously His color was poor, and there were suppressed breath sounds with an occasional dry rale over the left lower lung field

Six hours after birth, he was given his first feeding of 1/2 ounce of lactose, and thereafter he was fed every three hours for the first day With each feeding, he became cyanotic, gasping, and regurgitated part of the meal On the second day, feeding was discontinued and clysis substituted He voided normally and passed one meconium stool Death occurred at the fiftieth hour

Autopsy —The pertinent findings are confined to the thorax

The upper esophagus consists of a moderately dilated and hypertrophied pouch ending blindly at the level of the tracheal bifurcation The lower esophagus is a blind pouch, 2 cm in length, communicating with the stomach and capped by a solid mass of tissue 0 5 cm in height (Fig 1) A gap, 2 7 cm in length, separates the two segments and has only the loose areolar tissue of the mediastinum No communication or connection can be demonstrated either between the esophageal segments or to the tracheobronchial tree

Both lungs have an extensive acute pneumonia

The other organs show nothing of note No other anomalies are present

The entire midportion of the specimen, including the lower trachea and main bronchi, was removed en masse, blocked in toto, cut in serial section and examined No remnant of esophageal or tracheobronchial structure or fibrous cord could be found between the pouches, nor was there any esophageal structure buried within the tracheobronchial wall

Diagnosis —Atresia of mid third of esophagus without tracheobronchial fistula, acute bronchopneumonia

Congenital anomalies of the esophagus are comparatively rare but have recently been reported in increasing numbers Shukofsky and Baron, quoted by Cautley, stated that they occurred once in every 50,000 births [1] Among 20,000 births in the Maternity Hospital of San Giovanni at Rome, there was one [2] There were none in 30,000 births at Nancy [3] Reynolds and Morrissey reported that only one was seen in Bellevue Hospital in sixteen years [4] Guy Turner, quoted by Guthrie, found four among 10,543 births at the British Postgraduate School of Medicine [5] Rosenthal reported three in 2,400 deliveries [6] At the Babies Hospital, New York, there were 27 cases in twenty years [7]

The incidence at autopsy is more frequent but still uncommon Polson in 12,000 autopsies in Leeds General Infirmary encountered one case [8] Gajano found two in 900 autopsies performed at the Institute of Pathological Anatomy of Naples [9] In the Royal Hospital for Sick Children in Glasgow, among 6,916 autopsies, Guthrie found 38 esophageal malformations [5] At New York City Hospital, Welfare Island, there were three among 5,158 autopsies

Esophageal anomalies are now conceded to be due



FIG 1 Esophageal atresia The mid third of the esophagus is lacking The lower pouch is capped by a solid mass (arrow) of tissue

to development errors It is also recognized that sites of greatest embryologic events are those most prone to exhibit anomalous development The embryology of the esophagus and its anomalies has been well covered by Rosenthal Plass Abel, Vinson and others and has been summarized by Lanman [6,10–14] Both the esophagus and trachea are formed by a single tube of the primitive foregut. At the site where the tracheal bifurcation will be the lung buds develop from the anterior wall and the foregut becomes divided into two portions by longitudinal projections from the lateral walls Complete fusion of the projections forms the esophagus and tracheobronchial segments Incomplete fusion leads to the various anomalies reported.

The classification of esophageal anomalies most frequently followed in the American literature is that of Vogt, who divided them into three groups (1) complete absence (2) upper and lower pouches without tracheo-esophageal fistula and (3) upper and lower pouch with tracheo-esophageal fistula.[15] Plass's classification is more elaborate but includes all types of anomalies from complete absence of the esophagus to that in which the trachea and esophagus form a single sac. Abel gives an excellent schematic representation of various anomalies.[12]

There are many excellent reviews of the literature bringing the total number of reported cases to about 400 in number [6 10 16–19] The great majority 70 to 80 per cent comprises the malformation of an upper blind pouch and a lower pouch with a fistula to the tracheobronchial lumen [6 16–18] Those without fistula although less common form a not inconsiderable number In Plass's paper 20 instances are mentioned [16] Cautley quotes 20 Huntington 11 and Rosenthal 40 among 255 cases

Total absence of the esophagus to the best of our knowledge has not been reported in the last twenty-seven years There have been many cases of esophageal atresia without fistula They have one feature in common an upper pouch. The main deformity has always been in the lower portion a localization similar to the more common tracheo-esophageal fistula. The atresia of which there have been 12 instances has usually consisted of a cord connecting the pouches [6 14 17 26–27] There has been no connection between the pouches, as was true of the present case in a smaller number [5,8,9 14 28–32] In a few examples there has been only an upper pouch connected to the cardia by a cord or without any connection [9,33,34,35] In Cajano's case, a small solid mass of esophageal tissue lay above the diaphragm a mass similar to that capping the lower pouch in our case Carothers reported a more unusual anomaly [36] A fibrous band connected the upper pouch with the duodenum completely replacing the lower esophagus the entire stomach, and part of the duodenum.

Other types of anomalies are less common. Chapman reported a muscle band causing complete obstruction between the pouches.[6] A congenital membrane was found by Abel Perrault and Burman, and Fitzgibbons [12,37,38] Morse saw two cases with dilatable strictures apparently of congenital nature [39] Similar cases have been reported by Vinson and Fitzgibbons.[20,33] In other instances such as four cases of Humphries three of Ladd and one of Maes the absence or presence of connecting tissues between the pouches is not clear from the published data [7 40 41] There are some cases in the literature of doubtful nature although interpreted as congenital atresia by the authors.[42–46]

The occurrence and significance of congenital anomalies of other organs associated with malformations of the esophagus have led to conflicting conclusions. Plass found a high incidence [16] Humphries stated that they were infrequent and of no special significance, ten of his cases however had other anomalies although only one was of importance.[7] Ladd on the other hand found anomalies in 47 of 72 cases, many of which were serious and some incompatible with life [40] Many of the cases reported individually had no other anomalies.

Heredity probably plays no part, except in rare instances. One of Morse's cases was the brother of Rotch's patient.[39] Ealing stated that the child of an aunt had symptoms similar to his patient and died soon after birth [46]

Hydramnios has been deemed significant of anomalies of the digestive system by some observers.[6 27] Its occurrence has been noted by several.[33,47] Plass claimed it was only incidental since he found that it was present in only nine of the cases he reviewed Possibly it may be of value only as a warning to be prepared for a congenital anomaly should the child develop any of the characteristic symptoms.

The symptoms of esophageal atresia are characteristic.[6 14 17 48] The child usually appears perfectly healthy at birth and presents no external anomalies. If one is present it usually is anal or rectal atresia [14 21,22 49 48] There is early constant, excess mucus in the nasopharynx. Attacks of choking and cyanosis occur within a few hours of birth and are almost invariably precipitated by feeding Usually there is great eagerness for food but each feeding causes regurgitation and strangling. The sole exception to this group of symptoms was presented by Neff's patient in whom there was neither choking or cyanosis The abdomen is flat because the stomach does not contain air which is present with tracheo-esophageal fistula The stool consists of meconium and lacks cornified epithelium Farber has devised a special staining technic for its demonstration [50]

Esophageal stenosis tends to present a different *symptom complex from esophageal atresia.* The onset is usually later and may occur first in late infancy or even in childhood The most characteristic symptom is a vomiting habit The patient is usually underdeveloped physically and may subsist only on a soft or liquid diet due to inability to take solid foods without vomiting.

Roentgenologic examination is of great value and will demonstrate the upper pouch The pouch is visualized usually by the use of a barium mixture but because of the danger of pneumonia from aspiration many roentgenologists prefer lipiodol Furman and his coworkers advocated aeresophagoscopy without the use of any contrast medium since even the use of an iodized oil has its hazards [51] Selander

stressed the use of a lateral view of the thorax [52] The dilated upper pouch, according to him, causes compression and displacement of the trachea, a finding sufficient to justify a diagnosis of esophageal anomaly Absence of an air bubble in the stomach usually indicates that a tracheo-esophageal fistula is not present, although in a case of Haight and Townsley with fistula there was no air bubble in the stomach [53] Findlay voiced a word of caution in the interpretation of the roentgenologic findings they are similar in spasm and in congenital short esophagus [54]

Esophagoscopy has been employed for direct visualization and has proved of value particularly in stenotic conditions

Surgery offers the only satisfactory therapy for esophageal atresia The early attempts were unsuccessful, but within the last few years they have been more satisfactory [55–57] The technical features have been thoroughly covered in several articles and are beyond the scope of this paper [7 14 40 53 58] Suffice it to say that success depends on early diagnosis and the prevention of pulmonary complications from aspiration, particularly from the excessive mucous secretion of the upper pouch

Gradual dilatation of stenotic lesions has proved successful, particularly in older infants and children [20 38 39] Congenital membranes found during esophagoscopy have been punctured during the examination and followed by dilatation [12 37]

Summary and Conclusions

A case of congenital atresia of the esophagus from absence of mid third without tracheo-esophageal fistula is reported, and the pertinent literature is reviewed

Thanks are due to Dr A H Aldridge for permission to use the clinical data of the case presented

References

1 Cautley, E Brit. J Child Dis. 14 1 (1917)
2 Faberi M Clin. ostet 38 596 (1936)
3 Cornil L and Vermelin, N Progres. med 1 238 (Feb 7) 1931
4. Reynolds R. P and Morrissey W W Am. J Dis Child. 21 389 (1921)
5 Guthrie K J J Path and Bact 57 363 (1945)
6 Rosenthal A H Arch. Path 12 756 (1931)
7 Humphries G W III Surgery 15 801 (1944)
8 Polson Quoted by Chapman, A W Arch Pediat 50 343 (1933)
9 Cajano, A Pathologica 32 177 (1940)
10 Plass E D Johns Hopkins Hospital Reports 18 259 (1919)
11 Abel, A L Esophageal Obstruction London H Milford 1929, p 14
12 *Idem* Brit M J 2 469 (1928)
13 Vinson, P P The Diagnosis and Treatment of Diseases of the Esophagus Springfield Illinois Charles C Thomas, 1940 Chap 5 p 79
14 Lanman, T H Arch Surg. 41 1060 (1940)
15 Vogt E. C Am. J Roentgenol 12 463 (1929)
16 Huntington, J L., Young J H , and Fort, N C Boston M & S J 180 354 (1919)
17 Phelps, K. A. Ann Otol Rhin & Laryng. 39 364 (1930)
18 O Hare H A. Pennsylvania M J 40 914 (1937)
19 Ashley J D Jr Radiology 47 457 (1946)
20 Vinson, P P Coll Papers of Mayo Clinic 1923 vol 15 p 3
21 Hirsch I R J A.M A. 76 1491 (1921)
22 Sanders J H Brit. M J 2 938 (1926)
23 McLoone, J E Wisconsin M J 26 258 (1927)
24 Coronat M A Lyon méd 148 45 (1936)
25 Brovelli M Boll d Soc med -chir Pavia 52 455 (1938)
26 Addey, W Brit J Radiol 13 179 (1940)
27 Fukas, M Zentralbl f Gynäk 64 907 (1940)
28 Crowdy C T J Med. Res 33 469 (1928)
29 Neff F C Am J Dis Child. 22 57 (1921)
30 Skinner E H Am. J Roentgenol 8 319 (1921)
31 Roemans Bruxelles-méd 13 312 (1932–1933)
32 Unger A S and Poppel, H M Am J Roentgenol 40 240 (1938)
33 Sarradon, P Marseille-méd. 72 459 (1935)
34 Jorge J M , and Latienda R. I Rev Asoc. méd argent 57 596 (1943)
35 Willms S O J M. Soc New Jersey 35 737 (1938)
36 Carothers, R. Cincinnati M J 5 137 (1924–1925)
37 Perrault, L T , and Burman H I New York State J Med 33 1093 (Sept. 15) 1933
38. Fitzgibbons J H. Northwest Med 25 94 (1926)
39 Morse, J L. Am J Dis Child 19 144 (1920)
40 Ladd W E New England J Med 230 625 (1944)
41 Maes U Am. J Surg 1 153 (1926)
42 Tumarkin A J Laryng & Otol 48 489 (1933)
43 Gregory H H. C Proc Roy Soc Med 28 141 (1934–1935)
44. Guisez and Ronéche J de méd de Paris 52 724 (Sept. 8) 1936
45 Eckerstrom, S Acta pediat. 13 63 (1932)
46 *Ealing M J Brit M J 2 83 (July 20) 1940*
47 Theron, R Brit M J 1 652 (Apr 10) 1926
48 Reuss A R. Diseases of the Newborn New York W W Wood & Co 1923 p 251
49 Friedman E J Obst & Gynaec Brit. Emp 51 546 (1944)
50 Farber S J A M A 100 1753 (1933)
51 Furman M Dragutsky D Root G and Grossman, L. Radiology 38 326 (1942)
52 Selander E Acta radiol 22 802 (1941)
53 Haight, C , and Townsley H A Surg , Gynec & Obst. 76 672 (1943)
54 Findlay L Acta pediat 13 70 (1932)
55 Richter H M Surg Gynec & Obst 17 397 (1913)
56 Iglauer S Ann Otol Rhin & Laryng 43 1147 (1934)
57 Carter B N *Ibid* 73 485 (1941)
58 Lam C R J Pediat 27 456 (1945)

OUTLINE PLAN TO REPLACE PHYSICIANS

Dr Paul Magnuson, medical director of the Veterans Administration, reported that a plan has been worked out to replace the thirteen hundred physicians on loan from the Army and Navy who are expected to leave the agency this summer Outgoing military physicians will be replaced by three-year resident physicians

To assist the agency and simultaneously broaden opportunities for residents, prospective specialists will serve their final two years in veterans' hospitals, practicing under the supervision of certified consultants The agency now has a residency program covering the first three years of the specialty apprenticeship The advanced program will provide salaries from $4,100 to $7,000 annually —*J A M A , April 17, 1948*

NECROLOGY.

Alonzo Eugene Austin, M.D., New York City died June 20 at the age of eighty. Dr. Austin was graduated from New York Homeopathic Medical College in 1897. He had been a professor of materia medica at the New York Homeopathic Medical College and Hospital and was a staff member of Roosevelt Hospital and at Sloane Hospital for Women. Dr. Austin was a member of the American Institute of Homeopathy and the New York State and County Homeopathic Medical Societies.

Henry Pelouze de Forest, M.D., eighty-three, died at his New York City home on June 13. Dr. de Forest, who retired in 1947, received his medical degree from the College of Physicians and Surgeons, Columbia University, in 1890. He later studied and practiced at universities and hospitals in Vienna, Freiburg, Paris, Dublin, Edinburgh, Dresden and Berlin and served on the staff of Sloane Hospital for Women, New York City.

Dr. de Forest served as police surgeon from 1902 to 1912, as chief medical examiner of the Municipal Civil Service Commission from 1912 to 1919, and from 1917 to 1928 he held membership on the medical board of the Teachers Retirement Board. Dr. de Forest is credited with the establishment of the first fingerprint file in the United States. During the Spanish-American War, he was acting assistant surgeon of the Third Division Hospital. He also held the rank of major retired in the medical corps of the New York State Guard. From 1903 to 1921 he served as associate professor of obstetrics at New York Post-Graduate Hospital and Medical School. Dr. de Forest was a member of the New York Academy of Medicine, the Brooklyn Pathological Society, the American Medical Association and the New York State and County Medical Societies.

Edwin Howe Fiske, M.D., died at his home in Brooklyn on June 15. He was seventy-one years old. Graduated from Long Island College Hospital in 1901, Dr. Fiske interned at Kings County Hospital, after which he continued his studies at the University of Vienna. He joined the staffs of Kings County and Holy Family Hospitals in 1904, serving as head of the medical boards of these hospitals from 1912 to 1934. In 1917 he organized and headed an overseas medical unit from Kings County Hospital which set up Base Hospital 37 in Dartford, England.

Dr. Fiske served as consulting surgeon on the staffs of Mercy Hospital, Rockville Centre; Kings County and Bushwick Hospitals, Brooklyn, and Eastern Long Island Hospital, Greenport. Until 1938 he served as director of surgery at Holy Family Hospital, Brooklyn. He also had been professor of clinical surgery at the Long Island College Hospital and had taught at Bellevue Medical College. An organizer and charter member of the American College of Surgeons, he was a member of the Brooklyn Surgical Society, the American Medical Association, and the New York State and Kings County Medical Societies.

Frederick Howell Greene, M.D. of Poughkeepsie died on June 12 at the age of seventy-five. Dr. Greene was graduated from Albany Medical College in 1897. He served on the consulting staffs of Vassar Brothers and St. Francis Hospitals, Poughkeepsie, and was a member of the American Medical Association and the New York State and Dutchess County Medical Societies.

Anton Frederick Mannel, M.D., fifty-six, died at his home in Center Moriches, Long Island, on June 22. Dr. Mannel was graduated from New York University and Bellevue Medical School in 1914 and practiced medicine in Brooklyn for many years before becoming a resident of Center Moriches six years ago.

Otto Marburg, M.D., New York City, died on June 13. His age was seventy-four. Dr. Marburg, a native Austrian who fled the Nazis in 1938, was graduated from the University of Vienna in 1899. He continued his studies under Hans Oberstoiner, Wagner-Jauregg, Herman Oppenheim and Pierre Marie. He became a member of the staff of the Neurological Institute of the University of Vienna in 1905, was a full professor from 1916 to 1919 and was appointed director of the institute in 1919. During World War I he made an intensive study of injuries to the nervous system occurring in combat.

Noted in the field of neurology, Dr. Marburg had published numerous books and articles on neuroanatomy and neuropsychiatry, one of which was *Microscopic Topographic Atlas of the Central Nervous System* published in 1908 and considered a classic.

In this country Dr. Marburg became an American citizen and at the time of his death was a clinical professor of neurology at the College of Physicians and Surgeons, Columbia University, and a neurologic consultant on the staffs of New York Post Graduate and Montefiore Hospitals. A diplomate of the American Board of Psychiatry and Neurology, Dr. Marburg was an honorary member of the American Neurological Association, the New York Neurological Society, the Philadelphia Neurological Society, the Vienna Medical Society, the Neurological and Psychiatric Society of Argentina, and the Japanese Society of Neurology and Psychiatry. He was also vice-president of the International Neurological Congress and a member of the Academy of Sciences of France, the American Medical Association, the New York Academy of Medicine and New York State and County Medical Societies.

Ray Sixtus Nelson, M.D., died at his home in New York City on June 18. He was sixty-four years old. Dr. Nelson was graduated from Syracuse University Medical School in 1911 and interned at New York Skin and Cancer Hospital and was professor of dermatology at that hospital from 1915 to 1929. During the first World War he served as a major in the Army Medical Corps assigned to the port of embarkation in Brest, France and did research during the influenza epidemic in the fall of 1918. Dr. Nelson had also been attached to the former Neurological Hospital and to City Hospital on Welfare Island. He was pathologist for St. Francis Hospital and director of Cooper Laboratory, New York City. Dr. Nelson was a fellow of the New York Academy of Medicine and a member of the American Medical

Association, the New York Pathological Society, and the New York State and County Medical Societies

Olga Raissa Povitzky, M D, of New York City, seventy-one, died on May 21 Dr Povitzky was graduated from the Women's Medical College of Pennsylvania in 1901, and, following a period of private medical practice in New York City, she joined the City Department of Health In World War I she served with the U S Army in the women's medical unit in France For many years Dr Povitzky had charge of the manufacture of diphtheria toxoid at the William H Park Memorial Laboratory and had also experimented in serum research in an effort to combat influenzal meningitis She was a member of the American Association of Immunologists, the Society of American Bacteriologists, the American Public Health Association, and the New York Academy of Medicine

Anna Magilowa Reinstein, M D, died on June 21 at her home in Buffalo at the age of eighty-two Dr Reinstein, a physician for fifty-seven years before her retirement last February, was a graduate of the University of Berne in 1891

William M Smith, M D, of Olean, died at his home on May 29 He was forty-seven Dr Smith was graduated from the University of Buffalo, School of Medicine, in 1924 and took up medical practice in Olean In 1937, he joined the staff of the New York State Health Department During World War II, Dr Smith served with the Army Medical Corps with the rank of major and was assigned to the Army Air Forces At the close of the war he became chief of the Division of Preventive Medicine, State Department of Health, North Dakota, and, subsequently, acting state health officer He resigned that post and returned to Olean, resuming practice in March, 1947 He was on the staffs of Olean General and St Francis Hospitals, Olean Dr Smith was a member of the American Public Health Association, the American Medical Association, and the New York State and Cattaraugus County Medical Societies

William Henry Sugarman, M D, Brooklyn, died on June 23 at the age of sixty Dr Sugarman was graduated in 1914 from Cornell University Medical School A diplomate of the American Board of Internal Medicine, he was an associate physician on the staff of Jewish Hospital and had received an appointment, effective July 1, as an associate in medicine at Long Island College of Medicine Dr Sugarman was a member of the American Medical Association and the New York State and Kings County Medical Societies

Willis Ashton Tenney, M D, ninety-five, retired surgeon of Granville, died on June 12 Dr Tenney was graduated from the University of Vermont Medical School in 1877 He was a specialist in diseases of the eye, ear, nose, and throat and had practiced in Granville for more than sixty-five years when he retired in 1941 He was a member of the American Medical Association and the New York State and Washington County Medical Societies

Stephen Whitaker Wells, M D, died on May 21 at his home in Liberty at the age of seventy-two Dr Wells was graduated from the College of Physicians and Surgeons, Columbia University, in 1896 and interned at Paterson General Hospital, Paterson, New Jersey He had practiced medicine in Liberty for over fifty years He was also a physician on the staff of Maimonides Hospital, Liberty He was a member of the American Medical Association and the New York State and Sullivan County Medical Societies

August W F Westhoff, M D, Queens, aged eighty-seven, died on February 21 He was graduated from Bellevue Medical College in 1891 Dr Westhoff was director emeritus of the Medical Department of Wyckoff Heights Hospital, chief physician at Bethany Deaconess Hospital, and pathologist at St Catherine's Hospital, Brooklyn A fellow of the American College of Physicians, Dr Westhoff was also a member of the American Medical Association and the New York State and Kings County Medical Societies

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MEDICAL LICENSES REVOKED AND SUSPENDED

The Board of Medical Examiners of the State Education Department has notified the State Department of Health of action taken recently by the Board of Regents with respect to the medical licenses of the following persons

Gaspare Genova, 1257 70th Street, Brooklyn License suspended for one year, effective December 11, 1947

Leopold W A Brandenburg, 2802 Hudson Boulevard, Union City, New Jersey License permitting him to practice medicine in the State of New York revoked, effective November 25, 1947

Anne Elizabeth Kuhner, 52 Gramercy Park North, New York City License revoked, effective December 5, 1947

Boris Schlaifer, 2001 Strauss Street, Brooklyn License revoked, effective December 3, 1947

HOSPITAL NEWS

Ambulance Service to Be Considered in Hospital Planning

THE Hospital Council of Greater New York in its *Bulletin* issued June 25 stated that "changes in ambulance service hospital facilities, and related services are considered not as separate entities but as related functions and part of an over all community service

It was pointed out in the *Bulletin* that ambulance service is a transportation factor to be considered in hospital planning. The article stated that 'the significant feature of the ambulance service to be noted is the marked decrease in the total number of calls made after 1941 '

'Prior to 1942 doctors (usually interns regularly assigned to the ambulance service for specified periods) rode with the ambulance on every run, the *Bulletin* stated 'Many patients were discovered who did not need hospitalization or even emergency treatment in the hospital it continued, and the result was that the ambulance physicians treated many patients in the homes and did not take them to the hospital.

It was pointed out that in 1941 nearly 60 per cent of the total ambulance calls were in the category 'Treated and Not Removed. '

"With the coming of the recent war, the *Bulletin* continued, and the great demand for doctors in the armed services, it was decided to replace the ambulance physicians by trained attendants. With this change the home care function of the ambulance stopped and the service reverted to the sole function of transporting the sick and injured to the hospital. The *Bulletin* pointed out that calls in this new category Not Removed now represent less than 15 per cent of the total number of emergency calls

At the present time the city pays the voluntary hospitals which provide emergency ambulance service for the maintenance of each vehicle. The *Bulletin* commented that this payment is not intended to defray the cost of actual care rendered to the patients after admission As may well be expected many of the patients admitted by ambulance have little or no financial means for paying the hospital The city accepts these cases as city cases. Thus, the 'voluntary hospitals maintaining an ambulance service have contributed more to the community than is represented in the cost for maintaining the ambulance.

U S Approval Given to State Hospital Coordination Plan

THE State's long range plan for hospital construction, estimated to cost more than $750 000 000 has been approved by the Federal Public Health Service, Dr Robert T Lansdale, chairman of the State Joint Hospital Survey and Planning Commission, announced on June 20

This action paves the way for an $18,000 000 hospital building program in the next year, which will be financed with $6 000 000 of Federal funds and $12 000 000 from sponsors of local projects

Dr Lansdale said that the regional councils of the Hospital Planning Commission which drafted the plan were distributing applications for Federal funds to sponsors in high priority areas. Each application will be evaluated by the councils which will make recommendations for final action to the commission. The first approval is expected about August 1

The plan is based upon use of existing public and private nonprofit hospitals as far as possible It calls for

An additional 54 000 beds for general, chronic, and tubercular patients through construction of new hospitals and expansion of present institutions which meet modern requirements

Working arrangements between hospitals in seven regions to bring specialized services and the latest medical developments closer to the local doctor and his patients.

Fewer but larger better equipped and staffed general hospitals placing greater emphasis on disease prevention

A suitable general hospital within 15 miles of any populated point in the State.

Coordination of hospital facilities with existing medical schools and research laboratories

Primary centers of the hospital service regions are Buffalo Rochester Syracuse Albany, and New York City

Increased Interest in Psychiatric Training Report Shows

THERE were more doctors and nurses in training in the Westchester Division of New York Hospital last year than in 1946—a reflection of increased interest in psychiatric training according to the annual report of the Division published in June At the same time because of necessary building closings for repairs there were fewer patients cared for in 1947 than in the year before

Dr James H Wall, medical director, stated that although real progress has been made in clinical research, the hospital is handicapped by being short at least two fulltime staff members trained in research technics and by scattered laboratory facilities

Of the 275 new patients admitted during 1947, 218 or 80 per cent were residents of New York City and vicinity Included were 72 from Westchester World War II veterans among new patients numbered 29 Fifty-three per cent of the patients admitted during the year were discharged in six month's time or less Eighty-two per cent were discharged in less than a year's time

Analysis of admission diagnoses showed percentages of patients for various causes as follows manic-depressive psychoses, 29, schizophrenia, 23, psychoneuroses, 16, mental disorders associated with the involutional period, 8, alcoholism, 7

Merger of Ossining, Dobbs Ferry, and Tarrytown Hospitals Recommended

UNQUALIFIED assertion that a merger of the Ossining, Dobbs Ferry, and Tarrytown Hospitals is desirable, both from the standpoint of improving the services and limiting the deficit, has been made by a survey committee from the three hospitals

The study was made by Dr Claude W Munger, former head of Grasslands Hospital, William J Donnelly, expert on hospital management, and Charles W Davidson, a certified public accountant

In opening the study of the proposed merged hospital, the survey staff defined its area of coverage as from the northern line of Yonkers to the northern line of Croton, lying between the Hudson River and the Saw Mill River Parkway and Bronx Parkway Extension This area averages three miles in width and 18 miles in length, a total of about 54 square miles

Broken down to the current situation, the Tarrytown Hospital serves a population of 20,908, Ossining, 21,486, and Dobbs Ferry, 18,626

In relation to the generally accepted standard of 4 5 beds per 1,000 population, the report says, "all three hospitals now fall short of supplying the theoretical bed need" The combined hospitals, according to this computation, have a total bed capacity of 168, which is 106 4 under the accepted standard

City Will Test Music Therapy for Mentally Ill

AN EXPERIMENT in the use of music by swing bands, string ensembles, and other groups as a therapeutic measure to aid mentally disturbed persons was started on July 7 at Kings County Hospital, Brooklyn

Announcement of the project was made jointly by Dr Edward M Bernecker, Commissioner of Hospitals, and Richard McCann, president of Local 802 It will be the first such project in a New York City hospital

The music will be provided without charge by Local 802, American Federation of Musicians, an affiliate of the American Federation of Labor The musicians will be paid from funds collected by the union as royalties on records and transcriptions

Dr Sam Parker, director of psychiatry for the Department of Hospitals, is in charge of the new program He was circumspect about its possible results, but said that the objective is "to use music as a general environmental influence and to create an altered emotional atmosphere for the patients"

Dr Parker emphasized that the city was embarking on the project with no preconceived notions or plans, since the use of music to aid mentally disturbed persons has been tested only superficially thus far Kings County Hospital has more than 300 mental patients but only about half of them—those less seriously ill—will receive the musical therapy

One group of musicians will play jazz music for children and adolescents under psychiatric observation and treatment "with a view to determining the comparative values of different forms of music in the handling of youthful problems," Dr Parker said

Another ensemble will play semiclassical numbers and old favorites for adult patients "and thus provide a basis for studying the influence of music in various types of mental and emotional conditions," Dr Parker added

Free Health Center to be Established for Hotel Employes

THE New York Hotel Trades Council and the Hotel Association of New York City announced jointly in June that the property of the Y W C A at Fifteth Street and Tenth Avenue, New York City, had been bought for a new health center

According to Fred O Cosgrove, president of the association, 30,000 union employes of 150 hotels are scheduled to receive free treatment at the center Among the services will be general medical specialist care, laboratory and diagnostic procedures, periodic health examinations, immunizations, and other disease prevention measures

Money for purchasing, remodeling, equipping and maintaining the property and its staff will be provided by the hotel operators

This is an extension of the benefit program started in 1946, when a fund was established to provide life insurance and weekly sickness and accident benefits for employes and hospitalization for employes and their families

A joint association-council board of directors will govern the center with medical supervison under licensed physicians Selection of the director and staff will be by the board

NEWS NOTES

Every aspect of the work of Beth Israel Hospital New York City increased during the past year, according to the hospital's annual report A total of 9 254 patients, exclusive of the newborn, received 94, 669 days of medical care at the hospital during the year In addition 2 781 babies were born in the hospital during 1947, a record number, which may reflect the peak of the postwar birth rate Visits to the 41 clinics of the outpatient department increased by almost 10 per cent to 69 033

Completion of Millard Fillmore's ten-story modern addition in Buffalo a $980,000 structure requiring two years to build was celebrated by the hospital staff at a dinner June 3

Commenting on Millard Fillmore's growth Dr Harvey P Hoffman president of the medical staff and toastmaster, said On July 1 the entire hospital will be serviced by 25 resident physicians and 15 interns. The new laboratories on the sixth floor are equipped to furnish up-to-date data in bacteriology, biochemistry, basal metabolism electroencephalogy and serology Our x ray department is one of the finest in the state

During an outline on hospital procedures, Dr Hoffman praised the creation of a Research Committee under the chairmanship of Dr John Stewart professor of surgery at the University of Buffalo

The newly enlarged and renovated Moses-Ludington Hospital of Ticonderoga was opened for public inspection May 12 National Hospital Day according to an announcement by Charles A Hunt president The hospital as a result of the completed enlargement project, is now an ultramodern 80-bed facility, one of the finest of its size in the State and comparable in equipment and design with leading hospitals throughout the country Mr Hunt said

On the fortieth anniversary of its origin Goshen Hospital, started as an emergency measure to serve accident cases had a house full of babies, as well as medical and surgical patients, and announced the acquisition of baby handling equipment of the most modern and efficient type

In connection with the announcement it was revealed that Goshen Hospital has been entirely free of the infant diarrhea which recently has become a serious menace to the newborn Miss Ethel Low hospital superintendent, said

Walton Hospital Committee, a group of citizens interested in promoting the construction of a hospital in the village, has taken a decisive step toward the completion of its planning.

The committee has sent a request to Dr Basil C McLean a hospital consultant and director of Strong Memorial Hospital, Rochester to conduct a survey of hospital needs in the community He will advise the committee concerning the number of beds needed and how large the hospital should be

Dedication of a cornerstone for St Clare's new hospital in Schenectady was held June 13, with the Most Rev Edmund F Gibbons Bishop of the Albany Catholic Diocese officiating

A cancer detection center for Meyer Memorial Hospital in Buffalo is to be established in July, according to an announcement from Dr Elmer Friedland, who will be director of the center The center will be under the supervision of the hospital's staff tumor committee and will not provide therapy but will furnish a thorough physical examination with emphasis on the discovery of malignant diseases. Funds for the center were allocated by the New York State Division, American Cancer Society

At the beginning the center will conduct one session a week on Tuesday from 5.30 to 9.30 P M If additional sessions are required they will be conducted on Thursday evenings at the same hours Those over 30 years old will be eligible for examination but any person recommended by a physician will be accepted regardless of age Dr Friedland declared He added however that no person under treatment for cancer will be accepted

A recommendation for 115 more hospital beds for Rensselaer County and the need for 250 more tuberculosis hospital beds in the area suggesting enlargements of the Pawling Sanitarium, are contained in a coordinated State-wide hospital plan announced in June

The plan announced by the State Joint Hospital Survey and Planning Commission designated Troy and Rensselaer County as secondary or intermediate centers in the coordinated hospital plan. The report shows that Rensselaer County has a total of 627 hospital beds of which 503 are suitable and 124 unsuitable for long-range planning.

During the last ten years Our Lady of Victory Hospital Lackawanna has more than doubled the demands on its facilities according to a recent release from the hospital which points up the need for the new five-story addition In 1947 there were almost 5,100 admissions as against slightly more than 2 500 in 1937

The Dansville General Hospital will become Dansville Memorial Hospital, dedicated to honor Southern Livingston County's dead of World Wars I and II and provide an opportunity for perpetuating the memories of all loved ones in a way that will help others to live Hospital President James J Blum announced in June

Directors of the hospital took necessary action at a recent meeting to permit the change and the new name will become official with the erection of a new wing and the rehabilitation and modernization of the plant. The Dansville Memorial Hospital will be a modern 60-bed unit

[Continued on page 1644]

MEDICAL NEWS

Follow-up Program to Check TB Relapses in Veterans

ON JUNE 21, the Veterans Administration began a "follow-up" program to discover if there have been any relapses among veterans suffering from tuberculosis The program is designed to help prevent advanced disease and thus contribute toward safeguarding others through control of communicable tuberculosis

Each veteran-patient, before he is discharged from a veterans' hospital, will be urged to report at regular intervals for x-rays, fluoroscopic examinations, and other checks or treatments More than 13,000 veterans suffering from tuberculosis now are under VA care Another 80,763 are receiving compensation or pensions

Medical Officer Examination Announced

THE U S Civil Service Commission has announced an examination for filling medical officer (rotating intern and psychiatric resident) positions in St Elizabeth's Hospital, Washington, D C

Medical officers (rotating intern) are paid $2,200 for the first year and $2,400 for the second year Medical officers (psychiatric resident) are paid from $2,400 to $4,100 a year, depending upon the amount of approved postgraduate training the applicant has completed

Appointments are open for July 1, 1949 Internships consist of two years of rotating service, and psychiatric residencies consist of one to three years in psychiatry

To qualify for internships, applicants must be third or fourth year students in an approved medical school, however, they may not enter on duty until they have successfully completed the full course of study Applicants for psychiatric residencies must be graduates of an approved medical school, with the degree of doctor of medicine, and, in addition, they must have completed an approved internship or must now be serving such an internship No written test is required for the medical officer positions

Interested persons may secure information and application forms from the U S Civil Service Commission, Washington 25, D C, from most first- and second-class post offices, and from Civil Service regional offices Applications will be accepted until further notice in the Commission's Washington office

College of Physicians Offers Research Fellowships

THE American College of Physicians announces that a limited number of fellowships in medicine will be available from July 1, 1949, to June 30, 1950

These fellowships are designed to provide an opportunity for research training either in the basic medical sciences or in the application of these sciences to clinical investigation They are for the benefit of physicians who are in the early stages of their preparation for a teaching and investigative career in internal medicine

Assurance must be provided that the applicant will be acceptable in the laboratory or clinic of his choice and that he will be provided with the facilities necessary for the proper pursuit of his work The stipend will be from $2,200 to $3,200

Application forms will be supplied on request to the American College of Physicians, 4200 Pine Street, Philadelphia 4, Pennsylvania, and must be submitted in duplicate not later than November 1, 1948 Announcement of the awards will be made as promptly as possible

Postgraduate Work in Orthopedic Surgery Offered

PHYSICIANS seeking postgraduate work in orthopedic surgery will have an opportunity to study at the Hospital for Joint Diseases, New York City, according to an announcement by Frederick Brown, president of the board, and Dr J J Golub, executive director of the hospital

The course, being offered in affiliation with Columbia University, will consist of eleven morning and eleven afternoon sessions held on consecutive Thursdays, beginning October 7, and ending December 23, 1948

The curricula will include a series of lectures, case demonstrations, and conferences on the clinical, diagnostic, therapeutic, pathologic, bacteriologic, chemical, and radiologic aspects of skeletal disease, so integrated as to present a general review of the modern concept of the more important orthopedic diseases.

There will be opportunity for clinical examination of patients

Applications for registration should be made to the office of the assistant dean, graduate medicine, Columbia University, College of Physicians and Surgeons There is a fee

Obstetrics and Gynecology Changes in Board Requirements Made

A NUMBER of changes in Board requirements and regulations were made at the annual meeting of the American Board of Obstetrics and Gynecology, held in Washington, D C, from May 16 to May 22. At that time 231 candidates were certified.

Now bulletins are now available for distribution upon application and give details of all new regulations. These relate both to candidates and to hospitals conducting residency services for training

Foremost are the following

1 The ruling that applicants must receive adequate training in both obstetrics and gynecology has been defined as meaning a minimum of six months full time, in the branch of either obstetrics or gynecology relegated to a minor role in a candidate s training and preference for practice.

2 Acceptable preceptorship training is defined

3 The present regulation requiring at least six months of practice in the specialty following the completion of an acceptable training period has now been extended effective December 31 1949 to a requirement of two years post training practice limited to the specialty

4 Specific requirements for approval of hospital services for residency training are outlined

5 Effective immediately, there will be no further temporary approvals of hospital services for residency training. It is planned that all hospitals holding any type of residency training approval will soon either be resurveyed or initially surveyed by the Council on Medical Education and Hospitals of the A.M.A., so that all future approvals new or old, will be based entirely upon inspection following application It is expected also that certain resurveys will result in withdrawal of present residency approval from institutions where the educational and training standards are not being maintained

The next scheduled examination (Part I) written examination, and review of case histories for all candidates will be held in various cities of the United States and Canada on Friday, February 4 1949 Application may be made until November 1 1948 Application forms and bulletins are sent upon request made to American Board of Obstetrics and Gynecology Inc. 1015 Highland Building Pittsburgh 6 Pennsylvania.

U.S Grants $1,000,000 for Cancer Research

A BOUT $1 000,000 of Federal money was granted in June to 86 institutions for cancer studies The projects cover a wide variety of investigations, including use of radioactive materials against cancer Some of these have become more abundant as a result of the Government s atomic plants.

The grants were approved by the National Advisory Cancer Council and the United States Public Health Service The largest, for $85 064 goes to the University of California Medical School at San Francisco for a study of the value of chemical compounds in treating cancer

The College of Physicians and Surgeons at Columbia University New York, received $23,400 for studying breast cancer in mice and human beings and $8,370 for study of virus growth in tumors.

Memorial Hospital for Treatment of Cancer, New York, received $30,000 St. Vincent s Hospital New York $10 000 Haskins Laboratories New York $5,690, Overly Biochemical Research Foundation New York $14 004 New York University $6 023 Montefiore Hospital, New York $10,000 and New York Zoological Society, New York $6 046

Heart Research Aided by Grants

AN ADDITIONAL $103,000 in research funds for heart disease was announced by the Life Insurance Medical Research Fund New York City, raising to nearly two million dollars the amount provided by the Fund since its organization in December 1945 The awards, announced by M Albert Linton, chairman of the Fund include 12 student fellowships, three postgraduate fellowships and nine grants-in-aid to hospitals and universities.

Purpose of the fellowships, Mr Linton announced, is to help meet today's pressing need for qualified men and women trained in research technics. Student fellowships, amounting to between $1 500 and $1,800 go to students who have not yet received their doctorate degrees and provide for a year's additional undergraduate training under leading scientists Postgraduate fellowships amounting to between $2 500 and $4 000 go to graduate workers for similar study

Largest grant-in-aid announced by the Fund today is $18 375, which will go to Western Reserve University in Cleveland for research by Dr Normand L. Hoerr

To date, the Fund has made 103 grants in aid to forty-eight medical schools and has provided support for sixty research fellows The June list of awards is the second announced this year and brings the 1948 allocations to $637,000

Grants awarded in New York State went to Dr Jean Oliver, Long Island College of Medicine for research on the structural aspect of the metabolic process of the nephron to Dr Jane Sands Robb, Syracuse University College of Medicine, for research on the structure and function of the conducting system of the heart, and to Ardent Albert Flint, Jr, Loudonville to work under the supervision of Dr Harold G Wiggers at Albany Medical College.

ABSTRACT OF MINUTES OF THE COUNCIL OF THE MEDICAL SOCIETY OF THE STATE OF NEW YORK

THE Council held its organization meeting on Wednesday, May 19, 1948, in Room 111, at the Hotel Pennsylvania, New York City The following matters were considered

Secretary's Report

Remission of State Assessments —Remission of State assessments was voted on account of service with the armed forces for three members for 1948 and nineteen for 1947, also on account of illness for the following members according to county Bronx Charles E Haynes, 1948, A L Wincor, 1948, S H Nerenstone, 1948 Broome Palmer L Auker 1947 and 1948, Roger D Mead, 1948 Kings George F Herrity, 1947, Anne Cowan, 1947 and 1948, Stanley B Doyle, 1947 and 1948, Meyer D Rosenblum, 1947 and 1948, Julius B Boehm, 1948, J Arthur Buchanan, 1948, Jacob Sachs, 1948, James A Cooley, 1948 New York Katherine Siegel-Fuerst, 1948 Westchester James H Bannon, 1948

The rescinding of dues for 1946 for one member was authorized

Request from Dr David F King to be nominated for Affiliate Fellowship in the American Medical Association was granted

Communications —1 Letter from Mr H F Wanvig, Indemnity Representative, requested permission to employ Mr Linder to assist in establishing proposed improvements in Mr Wanvig's office

After discussion *it was voted* that the Council had no objection to Mr Linder's being employed by Mr Wanvig

2 Letter from Dr Conroe, Assistant Commissioner of Education, to Dr Anderton, dated April 26, 1948, as follows

This letter is in respect to your inquiry of April 7 hitherto acknowledged.

(1) It is the policy of the Board of Regents in most instances to license without further examination applicants who have been graduated from continental European medical schools who completed their medical education and requirements for licensure in Europe prior to 1914 This policy was established on the ground that medical education in most parts of Europe particularly in Austria and Germany was at its peak prior to 1914 and was fully the equivalent of that in effect in our State at the same time.

(2) The only European medical school graduates beginning their medical education after January 1 1940 who are considered eligible for admission to New York State medical licensing examination without further study or training are graduates from the medical schools of London University Cambridge University the National University of Ireland and the University of Dublin Occasional graduates of the University of Edinburgh, School of Medicine may be admitted to our licensing examination depending upon what is revealed in their records of study and training.

(3) Graduates of other European medical schools *matriculating after January* 1 1940, are required to take additional study or a minimum of two years of rotating internship or rotating residencies in approved hospitals before being considered eligible for admission to our medical licensing examination.

(4) Meanwhile it is our policy to advise any students seeking such information that we can give them no assurance at all to the effect that they will be eligible for admission to our licensing examination upon completion of a course of study in medicine in continental European schools unless by the time of the graduation of such students such schools have recovered satisfactorily and rather fully from the effects of the recent war There are numbers of students in continental European schools today who are there strictly of their own volition and without assurance from us that their records will be honored when they return here

Dr Anderton suggested "that the Council protest to the Board of Regents in the name of the State Society that the policy in granting licensure to practice medicine without examination to graduates from European medical schools who have graduated prior to 1914 is contrary to the interests of the public" Dr Simpson questioned the legality of it

It was voted that Dr Anderton answer the letter in the spirit of this discussion according to the facts that have now been brought before the Council

Treasurer's Report was accepted

Report of Executive Officer

Dr Hannon, Executive Officer, reported that he was arranging for Executive Committee meetings of the District Branches and that the first such meeting was held June 3 for the Fourth District Branch, in Glens Falls

Matters Referred from the House of Delegates

Resolutions regarding the Liaison Committee with the Veterans Administration were referred to the Council for rewording

It was voted that the rewording be left to Dr Anderton and Dr Bauckus with power

It was voted that the President be empowered to appoint the Board of Directors of the Veterans Medical Service Plan of New York, Inc , to be members of the special committee to represent the State Society as called for in the foregoing resolution

Preparedness Defense Committee —Dr Simpson brought up the matter of the appointment of the Committee on Preparedness Defense, as ordered by the House

It was voted that the President be empowered to appoint this Committee

War Memorial —*It was voted* that the Secretary be instructed to prepare the proper billheads and that these be sent to the county societies, and, that on the back of each bill should be printed "that the special assessment be due and payable now", also that a letter explaining the War Memorial be distributed with the bills to each member

It was voted that a letter be sent to each County Society Secretary with an explanation

Headquarters Room for A M A Delegates

It was voted that the Council request the Board of Trustees to appropriate $200 to pay for a meeting room for the use of our Delegates at the forthcoming A M A Convention

Appointment of Committee

The President appointed the Committee on Public Health and Education and its various subcommittees A complete list of committee appointments will appear in the next Minutes

CORRESPONDENCE

Clarifying the Mental Hygiene Issue

(A reply of the New York State Department of Mental Hygiene to a report of the Committee on Public Health Relations of the New York Academy of Medicine)

To the Editor

The NEW YORK STATE JOURNAL OF MEDICINE is to be congratulated for its sense of fair play and for the interest it displays in public and professional enlightenment by granting this space to the New York State Department of Mental Hygiene. Were there no correction of the misunderstanding which surely must have been generated by the report appearing on pages 529–534 of the JOURNAL'S March 1 issue, serious harm might be done the cause of the mentally ill of this state. Poorly substantiated criticism, either directly or by innuendo does not serve to advance science or the general welfare, on the contrary, it raises obstacles to progress. The JOURNAL is therefore rendering a commendable service in the following facts to replace the assumptions and generalities of the earlier article.

The report in question, entitled *Some Aspects of the Problem of the New York State Mental Hospitals System*, was prepared by E. H. L. Corwin Ph.D., and Thelma Pierce with the Committee on Public Health Relations of the New York Academy of Medicine, a reputable medical body dedicated to the development and dissemination of scientific (and by that token objective and unbiased) knowledge. Describing its report as a 'survey' of the State hospital system, the Committee states that it "supplemented its 'experience and observation with 'information secured from the Commissioner of Mental Hygiene of the State of New York, representative State hospital directors, and other sources, and that it combined these data with those obtained from the comprehensive literature on the subject.

The reader deserves to be informed that the above-quoted claims of the Committee constitute a gross misplacement of emphasis. It is an unhappy fact that practically everything in its report has already appeared elsewhere in print. The heavy hands of crusading feature writers lie upon some of it; the laments of producers of letters-to-the-editor are there; the findings of a national psychiatric body are presented and many of the suggestions are frankly based upon the recommendations of a legislative committee which completed its work four years ago, and whose observations are no longer valid or applicable. It would be interesting to learn just what in the report stems directly from the Committee's experience and observation.

As the present communication proposes to show, the report is a strange mixture of both acceptable and impractical recommendations, fact and hearsay, proposals of measures which have either long been in force or were put into practice within the past few years, and reckless new demands upon the public revenue.

Budget. At least one prejudicial and erroneous remark of the Committee must be corrected emphatically. Those responsible for the administration of New York's mental hospitals constantly appeal to the legislature for additional funds with which to do a proper job often without avail. Nothing could be farther from the truth. Back in 1942 and 1943 the Department of Mental Hygiene received an appropriation of only forty million dollars, the figure set for 1948–1949 is one hundred and seven million! Even taking into account the rise in prices during this period in the face of such increased allowances it is scarcely just to regard the State as being parsimonious toward its mentally ill.

Personnel. In neglecting to point out that shortage of personnel is a serious problem today among all kinds of hospitals—proprietary, voluntary and governmental—throughout the country, by implication the report leaves the reader with the false inference that understaffing is a characteristic peculiar to State mental hospitals. Furthermore the Committee was apparently not aware that on this score New York's State mental hospitals have been regaining during the past two years, the ground lost in the late war. On February 29 of this year nearly all the ward positions in these institutions were filled and there was virtually no problem in obtaining ward personnel except in some geographic areas where the difficulty is an inherent one. Surely this steady improvement in the situation could not have been accomplished if the positions were as unattractive as they are painted in the report.

The fact of the matter is that the beginning hospital attendant in a New York State hospital is now paid $2,208 a year, whereas in 1942 the figure was $1,252. Six years ago the attendant with four years of service received $1,396; today an attendant with this service is paid $2 600. Along with this the State hospital attendant has the security of a civil service position, pension rights, a full month's vacation with pay and generous sick leave allowance. Salary is in cash, and if complete maintenance is furnished it does not cost the attendant over 20 per cent of his salary.

It is by no means true that 'maintenance constitutes a major portion of their (the attendants') remuneration.' Only a few attendants are required to live on the hospital grounds (a minimum standby staff consistent with safe operation of the institution) and many of them even prefer to do so. For the employe who lives in, free hospitalization is accessible, and food and lodging are furnished at a modest cost. The current salaries, mentioned above are straight salaries the only deductions being for income tax and pension fund—and the latter is virtually a bank deposit, since the employe may borrow against it, and he takes his whole contribution with him if he leaves the service before he is eligible for pension.

We agree heartily that the well-trained attendant contributes to the adjustment of patients. For years the State hospitals have been training their attendants during a nine-month probationary period. Such training is now being expanded to a system-wide standardized course of 80 hours in all phases of ward management and care of patients.

The Committee does not distinguish itself when it draws heavily upon hearsay. Where else could it possibly have gathered the impression that his (the patient's) name is frequently unknown even to the nurse on his ward! This would be true only in the case of a nurse or attendant who had

been newly assigned to a ward, since these hospitals require that ward service personnel be thoroughly acquainted with all the patients in their care so that physical needs and changes in behavior can be called to the attention of the attending psychiatrist The Department is convinced by its own observation that this standard is upheld. In attacking the conscientiousness of the attendants the Committee is being decidedly unfair to a large body of workers who not only exhibit a deep sympathy for their charges but go out of their way to make extra efforts for their happiness and comfort

And what of the medical personnel? At the very bottom of the scale, the resident psychiatrist is paid a starting salary of $3,650, with an increase to $4,150 in his second year And at the time he is receiving this income he is given without charge an organized graduate resident training course in psychiatry (downstate at the State's Psychiatric Institute which enjoys the cooperation of instructors from the College of Physicians and Surgeons of Columbia University, upstate at Syracuse Psychopathic Hospital, Syracuse University Medical College) The Department of Mental Hygiene is willing to compare its program for recruiting and training psychiatrists with that of any other state

Shock Therapies Experience with shock therapies is being reported systematically, and statistics are being collected by the Department's institutions Shortly following Sakel's introduction of insulin shock therapy into the country, this and other convulsive therapies were introduced to the New York State hospitals, and their use at these institutions has been widespread since that time A considerable portion of the medical literature in these disciplines has emanated from the staffs of New York State's mental institutions When a recognized hospital journal recently published an article on shock therapy, it made use of the statistics of Ross and Malzberg, of this Department The figures were for 1939, so it is quite evident that New York's State hospital system has long kept statistics on these disciplines The statistics of this Department on shock therapy results are widely quoted

Alcoholics The Committee states, "For the most part, alcoholic patients admitted to mental hospitals are suffering from acute episodes and do not need the type of care which the State mental institution is planned and equipped to render" It should be borne in mind that the mental hygiene law forbids the institutions of this Department to accept inebriates who are not mentally ill While the impression may prevail that alcoholics accepted in the State hospitals do not show as vivid pictures of psychotic makeup as do patients in some other diagnostic categories, they are nevertheless psychiatric problems It is of course possible that some patients may on admission be in an acute phase of alcoholism, but this is usually one in a long-standing history of such episodes, and when the acute phase clears, residuals of organic damage and of personality disorder are observed Many such patients may show a higher level of adjustment to the controlled environment of the mental hospital None are kept, however, who can cope with the more complicated problems on the outside Relapse, which occurs frequently within a short time, may cause readmission, but such patients are not kept by the institute if the community can absorb them

Nurse Training On the last page of the report it is stated "Affiliation should be arranged with general hospitals to provide psychiatric training for all student nurses" Nothing else that the Committee has said is stronger proof of its lack of acquaintance with past and present conditions Not only has such an affiliation arrangement prevailed for years, but at this time, of the 104 schools of nursing in general hospitals in the State, 82 send their students to State hospital schools for training and experience in psychiatric nursing A recent study shows that over 95 per cent of nurses educated in New York State receive experience in psychiatric nursing, and New York's State-operated mental hospitals provide the lion's share of this training

Family Care The Department of Mental Hygiene is glad that the Committee brought up the matter of family care, because the opportunity is thus provided to clarify the somewhat common misunderstanding of this program—a misunderstanding which evidently is shared by the Committee In the report it is suggested that the State's family-care program for the mentally ill be "re-evaluated," but it develops that all the Committee has in mind is an increase in family-care allowances Family care is primarily therapeutic in purpose, although it does serve incidentally to release a few beds in the hospitals For a certain type of patient, usually along in years, family care offers a chance to make a limited social adjustment in uncomplicated surroundings, for certain patients with a good prognosis the family-care home furnishes a sort of transitional socializing experience following improvement under hospital care and treatment

Foster homes are not selected as one would choose a boarding house, the families must have the disposition, intelligence, and enthusiasm for doing a service for their fellow man, and they must be willing to perform this service altruistically, not on a commerical basis No, the family-care program will not serve its purpose on the basis suggested by the Committee

Reimbursement The complaint about reimbursement practices apparently refers to conditions which may have prevailed prior to 1943 It cannot be supported today Regular periodic investigations as well as special reinvestigations are made of the financial ability of relatives to pay, and the salaries which are reported on financial statements are verified (We do not believe that it would be practical or even advisable to require notarization of these statements) Rates are being continually increased, decreased, or canceled in line with any substantial change in ability to pay That more efficient collection methods are being used is obvious when one notes that total collections have steadily increased, even in the face of the rising cost of living and of the loss of overtime employment which existed during the war years The numbers of contributing relations have more than doubled in the last three years

It can be stated definitely that no discrimination is ever shown between reimbursing and nonreimbursing patients No patient was ever discharged from a New York State hospital because of failure to reimburse either in whole or in part Conversely, no patient has been retained at an institution longer than necessary merely because of financial ability or willingness to pay the full reimbursement rate Has the Committee considered the seriousness of its charge?

Clinics and Follow-up There is no denying that a need exists for a greater number of adult mental hygiene clinics, and the Department of Mental Hygiene would be among the first to welcome a rapid growth of such services The Department's in-

stitutions conduct 70 mental hygiene clinics and locally developed facilities of this kind would round out the program Besides, in the preventive sphere the State hospitals and State schools and the Department s division of prevention provide 109 regularly scheduled child guidance clinics plus a large number held on request the case load at the regular clinics alone in 1946 and 1947 was 5,973 These community-centered operations, however vital are of necessity a secondary consideration because of the pressing need for aftercare of patients from the State s mental institutions and the great shortage of psychiatrists social workers and other personnel

This brings up another amazing remark on page 532 of the report in question Psychiatric clinics would serve another purpose. They would make possible the discharge from mental hospitals of many of those patients who remain in the institutions solely for supportive treatment Where has the Committee been for the past two or three decades? The first "parole clinic of this Department was established in 1911 at Manhattan State Hospital. In the years that followed, the practice grew rapidly so that clinics for patients in convalescent care (not to mention the facilities which pave the way for patients being considered for convalescent care) have long been integral units in the hospitals programs

A strong implication is made in the report that large numbers of patients ready to go home are ignored and as a consequence must languish in the State hospitals. This is a monstrous accusation We hasten to assure readers of the JOURNAL that every patient who might conceivably make an adjustment outside the hospital is given a trial in the community During 1946 and 1947 18,853 patients were on convalescent status in the same period 6,053 such patients were discharged from the books of the hospitals, 4 652 had to be returned (of whom many would undoubtedly be given later trials) and a considerable number were still in convalescent care at the conclusion of their one-year period of convalescence. The Committee suggests that the clinics could serve the domestic relations and juvenile courts boards of health and education, visiting nurse organizations, and welfare agencies They already do such contacts are everyday experiences, although admittedly they could be extended.

The Hospitals and the Communities The whole matter of community relations with State mental hospitals is poorly understood by the Committee. Many staff members hold teaching positions in the nearby universities and medical schools week after week through the year groups of medical students and social science classes are visiting the institutions, where they are taken on tours of inspection and attend lectures and clinical demonstrations, medical societies in some areas hold meetings at the State hospitals and some of our staff members are officers of the societies veterans groups pay regular calls to cooperate in entertainments for ex-service patients. But why go on? It is a fact that the more remote a State hospital is, the more anxious it is to participate in the life of the surrounding community

Location of Hospitals The State mental hospitals are located more or less centrally in the districts which they serve. Of course the New York metropolitan area is an exception since many patients who are residents of the city have to be cared for in several Long Island institutions The remoteness of these hospitals is merely a reflection of public opinion which influenced State policy at the time these hospitals were built. But will the citizens of New York State support the purchase of the high priced real estate which would be needed to house and treat these mental patients in spots accessible to the city s medical center and abandon the existing ones? It is hardly likely Academicians can deal blithely with budgetary matters but they should realize that when it comes to a State public service, it is the taxpayer who must be convinced Would the Committee be willing to answer to the public for the scrapping of a State-wide system of building plants which was bought at great cost over the years?

Overcrowding and Plans for Future Ever since New York's first State mental institution was opened 105 years ago overcrowding has been a bugbear That is why this Department s program of reconstruction includes plans for enlargement and modernization to the tune of more than a hundred million dollars To date the legislature has appropriated over sixty millions of New York State s Postwar Reconstruction Fund

In conclusion the Department of Mental Hygiene wishes to make clear that it is well aware of its problems and has no desire to resist honest intelligent, constructive criticism It has no doubt that the Committee had the best of intentions and will welcome this clarification of the issue.

FREDERICK MACCURDY, M D
Commissioner of Mental Hygiene

May 25 1948

To the Editor

'Blessed are the meek if only because no suspicion attaches to them unlike the lady who doth protest too much

Under the lash of aroused public opinion following the Moreland investigation the State Department of Mental Hygiene woke up from its deep slumber and wrought improvements which make a creditable showing

The almost hysterical reaction to the statements and the numerous recommendations in the report of the Committee on Public Health Relations of the New York Academy of Medicine suggests an attitude of smugness on the part of the Commissioner and his immediate staff and a disposition to cavil over minor points. Our report was prepared on the basis of statements and figures given to us by the Commissioner himself as well as a number of men associated with the Department, and the notes taken at our conferences were submitted to the Commissioner for verification The purported minor inaccuracies either of figures or of statements

[Continued on page 1044]

BOOKS

Books for review should be sent to the Book Review Department at 1313 Bedford Avenue Brooklyn N Y Acknowledgment of receipt will be made in these columns and deemed sufficient notification. Selection for review shall be based on merit and interest to our readers

RECEIVED

Pictorial Handbook of Fracture Treatment. By Edward L Compere, M D , and Sam W Banks, M D Revised with the assistance of Clinton L Compere, M D Illustrated by Harold Laufman, M D Second edition Large duodecimo of 390 pages, illustrated. Chicago, Year Book Publishers, 1947 Cloth, $5 50

Gifford's Textbook of Ophthalmology By Francis H Adler, M D Fourth edition. Octavo of 512 pages, illustrated Philadelphia, W B Saunders Co , 1947 Cloth, $6 00

Pharmacology, Therapeutics, and Prescription Writing For Students and Practitioners By Walter Arthur Bastedo, M D Fifth edition Octavo of 840 pages, illustrated Philadelphia, W B Saunders Co , 1947 Cloth, $8 50

A Textbook of Clinical Neurology With an Introduction to the History of Neurology By Israel S Wechsler, M D Sixth edition. Octavo of 829 pages, illustrated Philadelphia, W B Saunders Co , 1947 Cloth, $8 50

Clinical Diagnosis by Laboratory Methods By James Campbell Todd, M D , and Arthur Hawley Sanford, M D , with the collaboration of George Giles Stilwell, M D Eleventh edition Octavo of 954 pages, illustrated Philadelphia, W B Saunders Co , 1948 Cloth, $7 50

The Acute Bacterial Diseases Their Diagnosis and Treatment. By Harry F Dowling, M D , with the collaboration of Lewis K Sweet, M D , and Harold L Hirsch, M D Octavo of 465 pages, illustrated Philadelphia, W B Saunders Co , 1948 Cloth, $6 50

Physiology of Exercise By Laurence E Morehouse, Ph D , and Augustus T Miller, Jr , Ph D Octavo of 323 pages, illustrated St Louis, C V Mosby Co , 1948 Cloth, $4.75

Handbook of Treatment and Medical Formulary By Charles M Gruber, M D Octavo of 585 pages Philadelphia, F A Davis Co , 1948 Cloth, $7 00

The 1947 Year Book of Neurology, Psychiatry and Neurosurgery Neurology edited by Hans H Reese, M D , and Mabel G Masten, M D , Psychiatry edited by Nolan D C Lewis, M D , Neurosurgery edited by Percival Bailey, M D Duodecimo of 702 pages, illustrated Chicago, Year Book Publishers, 1948 Cloth, $3 75

Modern Plastic Surgical Prosthetics. By Adolph M Brown, M D Octavo of 293 pages, illustrated New York, Grune & Stratton, 1947 Cloth, $6 75

Practical Methods in Biochemistry By Frederick C Koch and Martin E Hanke Fifth edition Octavo of 419 pages, illustrated Baltimore, Williams & Wilkins Co , 1948 Cloth, $3 00

Clinical Studies in Psychopathology A Contribution to the Aetiology of Neurotic Illness By Henry V Dicks Second edition, Octavo of 238 pages Baltimore, Williams & Wilkins Co , 1947 Cloth, $4 50

Textbook of Gynecology By Emil Novak, M D Third Edition Octavo of 742 pages, illustrated Baltimore, Williams & Wilkins Co , 1948 Cloth, $8 00

The Metabolic Brain Diseases and Their Treatment. In Military and Civilian Practice By G Tayleur Stockings, M B (England) Octavo of 262 pages, illustrated Baltimore, William & Wilkins Co , 1947 Cloth, $4 50

Encyclopedia of Medical Sources By Emerson Crosby Kelly, M D Octavo of 476 pages Baltimore, Williams & Wilkins Co , 1948 Cloth, $7 50

The Medical Clinics of North America. Nationwide Number March, 1948 Octavo Philadelphia, W B Saunders Company, 1948 Published Bi-Monthly (six numbers a year) Cloth, $16 net, Paper, $12 net

Plague Laennec (1782–1826) Inventor of the Stethescope and Father of Modern Medicine By Arthur N Foxe, M D Octavo of 122 pages, illustrated New York, Hobson Book Press, 1947 Cloth, $2 50

Municipal Health Services By Norman Wilson D P A Duodecimo of 178 pages New York, Macmillan Co , 1946 Cloth, $1 75

The Problem of Cerebral Palsy Today By M A Perlstein, M D Prepared with the assistance of William McPeak Octavo of 57 pages, illustrated Chicago, National Society for Crippled Children and Adults, 1947 Paper, 25¢

Understandable Psychiatry By Leland E Hinsie, M D Octavo of 359 pages New York, Macmillan Co , 1948 Cloth, $4 00

Epilepsy [Res Publ Ass Nerv Ment Dis Vol 24] Editorial Board William G Lennox, M D , H Houston Merritt, M.D , and Thomas E Bamford, M D Octavo of 654 pages, illustrated Baltimore, Williams & Wilkins Co , 1947 Cloth, $12

Psychosocial Medicine A Study of the Sick Society By James L Halliday, M D Octavo of 278 pages, illustrated New York, W W Norton & Co , 1948 Cloth, $3 50

Taking the Cure The Patient's Approach to Tuberculosis By Robert G Lovell, M D Illustrated by Donald Gooch Duodecimo of 93 pages, illustrated New York, Macmillan Co , 1948 Cloth, $2 00

The Battle of the Conscience A Psychiatric Study of the Inner Working of the Conscience By Edmund Bergler, M D Octavo of 296 pages Washington, D C , Washington Institute of Medicine, 1948 Cloth, $3 75

Interesting and Useful Medical Statistics Edited by William H. Kupper, M D Octavo of 528 pages Dubuque, Iowa, Wm C Brown Co , 1948 Cloth, $6 50

Biology of Disease By Eli Moschcowitz, M D Quarto of 221 pages, illustrated New York, Grune & Stratton, 1948 Cloth, $4 50

The 1947 Year Book of Endocrinology, Metabolism and Nutrition Endocrinology edited by Willard O Thompson, M D , Metabolism and Nutrition edited by Tom D Spies, M D Duodecimo of 575 pages, illustrated Chicago, Year Book Publishers, 1948 Cloth, $3 75

REVIEWED

Synopsis of Allergy By Harry L. Alexander M D Second edition Duodecimo of 255 pages illustrated. St. Louis C V Mosby Co., 1947 Cloth, $3 50

This is a brief practical handbook on allergy for students and practitioners by an expert who has made significant contributions to the field. It is sound and reliable and is recommended

ANDREW BABEY

Diseases Transmitted from Animals to Man. By Thomas G Hull Ph D Third edition Octavo of 571 pages, illustrated. Springfield Ill Charles C Thomas 1947 Cloth $10 50

This third edition is an excellent compilation and description of many diseases. It is timely being enhanced by the inclusion of many new chapters The book is well illustrated by many figures and tables and includes numerous valuable references to the literature Together with the additional material and the revision of previous editions it maintains the standards which it has established. It is most valuable for workers in medical and animal bacteriology with special reference to the transmission of micro-organisms from animal to man

MAX LEDERER

Peace of Mind. By Joshua Loth Liebman Octavo of 203 pages. New York, Simon & Schuster 1946 Cloth, $2.50

This book is a sympathetic, well-written popular presentation of the psychoanalytic concept of personality By avoiding technical jargon and the more bizarre examples of personality disorders so often used to spice popular discussions of personality problems the author has made modern concepts palatable and helpful to many people whose traditional beliefs had previously kept them from receiving any benefit from psychotherapy

Perhaps the only weakness in the book is its rather superficial treatment of basic philosophic and theologic problems This may however prove an advantage rather than a disadvantage in a popular work.

ARTHUR SHAPIRO

Standard Methods of the Division of Laboratories and Research of the New York State Department of Health. By Augustus B Wadsworth M.D Third edition. Octavo of 990 pages illustrated Baltimore Williams & Wilkins Co 1947 Cloth, $10

For many years Wadsworth's *Standard Methods* has been a necessary work in every laboratory of bacteriology and public health. This new and greatly enlarged edition maintains the high standards of its predecessors. Specific and complete details are given for every diagnostic test and for every bacteriologic and serologic procedure as well as for the preparation of vaccines toxins antitoxins and other diagnostic and therapeutic sera. The chapter on the serodiagnosis of syphilis has been completely revised

ARNOLD H EGGERTH

Arthritis and Related Conditions. Edited by Theodore Franklin Bach M.D Octavo of 472 pages illustrated Philadelphia F A Davis Co 1947 Cloth $6 50

This is a useful review of the main points on arthritis with fairly detailed consideration of therapy One specially good chapter concerns the use of procaine in various rheumatic conditions. There is a complete section on the use of x rays for therapy This book makes interesting useful reading and is worthy of study

ANDREW BABEY

Curare Its History Nature, and Clinical Use. By A R. McIntyre M D Octavo of 240 pages illustrated Chicago University of Chicago Press 1947 Cloth, $5 00

This timely monograph was prompted by the ever widening field in the recent use of curare as a supplement to inhalational anesthetics The chapter on the clinical use of curare well illustrates its dual basis chief of which is the well-recognized peripheral or classical action and the second of which, especially with prolonged curarization or heavy initial doses is central depression of the nervous system

Physicians who include anesthesia in office practice as well as those who specialize in its administration will benefit by the information this work offers.

S INGRAM HYRKIN

Penicillin Therapy Including Streptomycin Tyrothricin, and Other Antibiotic Therapy By John A. Kolmer Second edition Octavo of 339 pages, illustrated New York, D Appleton-Century Company 1947 Cloth $6 00

In the second edition of this review of antibiotic therapy Dr Kolmer has revised and brought up to date his chapters on streptomycin tyrothricin and streptothricin The most recent literature has been gone into regarding the larger doses of penicillin which predispose to intravascular thrombosis as a result of which heparin is suggested as an adjunct to penicillin therapy The references are most complete and the entire presentation of the book is lucid accurate, and covers fully the subject of antibiotics and their clinical applications

LEO LOEWE

Diagnostic Bacteriology A Textbook for the Isolation and Identification of Pathogenic Bacteria for Medical Bacteriology Laboratories. By Isabelle Gilbert Schaub A B and M Kathleen Foley, A B Third edition. Octavo of 532 pages St. Louis C V Mosby Co 1947 Cloth $4 50

This the third edition of *Diagnostic Bacteriology* by Schaub and Foley has been considerably enlarged in scope and content It is a mine of information of a practical nature for the identification of the bacteria commonly prevalent in medical practice. The authors have tried to incorporate the tricks of the trade to simplify the problem of diagnostic bacteriology In this attempt they have succeeded admirably As a reference it should prove invaluable to the bacteriologist and his technologists.

MAX LEDERER

Color Atlas of Hematology With Brief Clinical Descriptions of Various Diseases. By Roy R Kracke M.D Octavo of 204 pages illustrated Philadelphia J B Lippincott Company 1947 Cloth $5 00.

This is a fine brief textbook on diseases of the

blood Together with short summaries of diseases, excellent color plates are shown to illustrate cell types There is a fine chapter on bone marrow, also an admirable section on technic, together with a summary of the findings of the many diseases in which a knowledge of blood changes may be helpful This book is warmly recommended to students and physicians also

ANDREW BABEY

Food and Health By Henry C Sherman, Sc D New Edition Octavo of 290 pages New York, Macmillan Company, 1947 Cloth, $4 00

This is a new edition, the original of which appeared in 1934 Much of the valuable empirical knowledge of foods has since been proved experimentally The author brings this knowledge up to date He stresses the importance of natural foods containing all nutrient elements as against refined impoverished foods This book, though written for the layman, is recommended to all interested in nutrition

MORRIS ANT

Gynecology With a Section on Female Urology By Lawrence R Wharton, M D Second edition Octavo of 1,027 pages, illustrated Philadelphia, W B Saunders Company, 1947 Cloth, $10

In this edition the author has revised his text to include the advances made in gynecology The sections on embryology and congenital malformations have been almost completely rewritten As in the first edition female urology is presented in detail, and in this section are new chapters on the female urethra and water cystoscopy The revisions have considerably increased the value of the text and it is highly recommended to the profession

ALEXANDER H ROSENTHAL

Fundamentals of Clinical Neurology By H Houston Merritt, M D , Fred A Mettler, M D , and Tracy Jackson Putnam, M D Octavo of 289 pages, illustrated Philadelphia, Blakiston Company, 1947 Cloth, $6 00

This well-written handbook by three prominent authors contains a wealth of information, including neuroanatomy, neurophysiology, and clinical neurology The reviewer recommends this book for every clinician as a valuable reference volume

A M RABINER

Dermatologic Clues to Internal Disease By Howard T Behrman, M D Octavo of 165 pages, illustrated New York, Grune & Stratton, 1947 Cloth, $5 00

This book of 161 pages is an attempt to correlate many dermatoses with visceral dysfunction The author discusses over 150 conditions, dermatologic or otherwise, arranged alphabetically It is written entirely too concisely for the nondermatologist to grasp Some of his statements are not up to date He places contact dermatitis and the tuberculin type of hypersensitiveness as manifestations in hypersensitive individuals, such as asthmatics They occur just as frequently in nonatopics In many of the conditions mentioned no internal connection is shown by the author

The whole subject matter can be grouped under four headings (1) Dermatoses with no known internal connections as scleroderma and pemphigus (2) Dermatoses associated with similar internal involvements as Kaposi's sarcoma, Recklinghausen's disease, sarcoidosis (3) Internal conditions occasionally showing skin manifestations as leukemia, Hodgkin's disease, and colitis (4) Dermatoses due to internal diseases as endocrine disturbances, avitaminosis, and xanthoma In general it can be stated that the book only partially (the last two groups) gives "dermatologic clues to internal diseases"

ABRAHAM WALZER

Atlas of Cardiovascular Diseases Correlation of Clinical Electrocardiography and Cardiac Roentgenology with Clinical History and Autopsy Findings By Irving J Treiger, M D Quarto of 180 pages, illustrated St Louis, C V Mosby Co , 1947 $10

This *Atlas* is especially valuable for the fine x-ray pictures, necropsy specimens, and electrocardiograms which accompany each case It contains a good deal of information which will prove very helpful for students and practitioners

ANDREW BABEY

Urology in General Practice By Nelse F Ockerblad, M D Second edition Octavo of 392 pages, illustrated Chicago, Year Book Publishers, 1947 Cloth, $5 75

This, the second and up-to-date edition, contains nearly four hundred pages of valuable clinical material both in diagnosis and treatment The work is clear, concise, comprehensive, and well illustrated, and represents a valuable contribution by an outstanding urologist The book, while intended for the general physician, can be well used by medical students and by residents-in-training for the specialty

AUGUSTUS HARRIS

Mental Mischief and Emotional Conflicts Psychiatry and Psychology in Plain English By William S Sadler, M D Octavo of 396 pages St Louis, C V Mosby Company, 1947 Cloth, $6 00

The nervous patient almost invariably suffers rather than profits from reading literature concerning the mechanisms of the mind However, for the normal lay reader this excellent book written by a psychiatrist with forty years of experience offers a wealth of information

LAURENT FEINIER

Rehabilitation Through Better Nutrition University of Cincinnati Studies in Nutrition at the Hillman Hospital, Birmingham, Alabama By Tom D Spies, M D Octavo of 94 pages, illustrated Philadelphia, W B Saunders Company, 1947

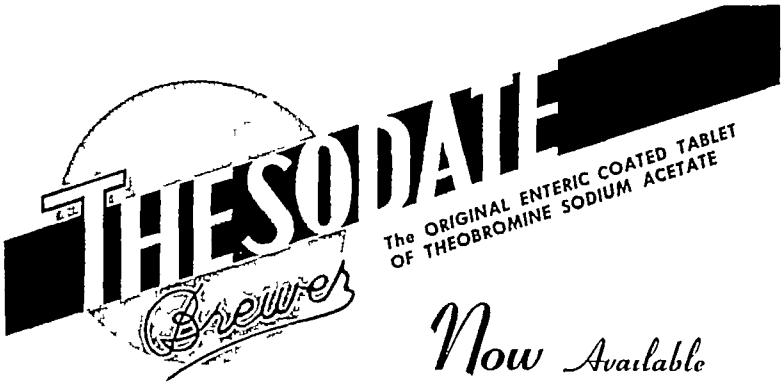
This small volume describes proved vitamin deficiencies and the anemias The physician is given pointers in diagnosis and treatment The contents are the result of many years of observation and are a practical application of present-day knowledge The book is recommended for every practicing physician

M ANT

Gastritis By Rudolf Schindler, M D Octavo of 462 pages, illustrated New York, Grune & Stratton, 1947 Cloth, $10

The author, a pathologist and pioneer gastroscopist, attempts to present in his monograph the

[Continued on page 1640]



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[Continued from page 1638]

subject of gastritis from the pathologic, gastroscopic, and clinical points of view He thoroughly covers the literature on the subject and expresses his own opinion backed by case presentations and pathologic demonstration wherever possible

Dr Schindler, with his vast experience in gastroscopy, fills the gap where gross pathology fails The book should be part of the internist's, as well as of the pathologist's, medical library

JAMES TESLER

Bone and Bones Fundamentals of Bone Biology By Joseph P Weinmann, M D , and Harry Sicher, M D Octavo of 464 pages, illustrated St Louis, C V Mosby Company, 1947 Cloth, $10

This book is obviously a labor of love by an anatomist and pathologist, teaching in the College of Dentistry of the University of Illinois It is superbly illustrated, and has an extensive bibliography Fundamentals of bone growth and disease are stressed, radiographs are rare while histologic illustrations are abundant One important omission is "march fracture," so common in military life and an exception to the author's statement that "fractures of bones are caused by trauma of short duration" Nor is the osteoporosis of the senile and that of women after the menopause thoroughly discussed, but adequate references are supplied in this field For the pathologist and internist, as well as for the dentist, this book serves its purpose well

WILLIAM DOCK

The Medical Clinics of North America Nationwide number March, 1947 Octavo Philadelphia, W B Saunders Company, 1947 Published Bimonthly (six numbers a year) Cloth, $16, net, Paper, $12 net

The March number of the *Medical Clinics of North America* is a nationwide survey of diabetes Most of the articles are from New England, several are from Philadelphia and the Mayo Clinic There are brief references to juvenile diabetes, insulin mixtures, the glucose tolerance test, pregnancy and diabetes, and management of coma As usual, the *Clinics* are worth reading with care

ANDREW BABEY

Essentials of Endocrinology By Arthur Grollman, M D Second edition Octavo of 644 pages, illustrated Philadelphia, J B Lippincott Company, 1947 Cloth, $10

Here is a thoroughly literate and scientific chart of the vast "sea of endocrinology" A bewildering literature on this subject has grown rapidly in recent years, replete with assumptions, vocabulary and many, many pieces of data Out of all these emerges Dr Grollman's cool appraisal—a lucid, fascinating, accurate, and documented text

The interrelationships among the glands of internal secretion are drawn as honestly as present facts allow The charts and illustrations are clear and to the point The clinical scientist will appreciate the rational and specific therapies that are advised The research scientist will find ready reference to the basic physiologic and pathologic facts

MAURICE TULIN

Recent Advances in Clinical Pathology By Various Authors Produced under the Auspices of the European Association of Clinical Pathologists General Editor, S C Dyke, D M (Oxon) Duodecimo of 468 pages, illustrated Philadelphia, Blakiston Company, 1947 Cloth, $5 50

This is an excellent number of the *Recent Advances* series published from time to time in England It reflects the practice of the best clinical pathologists in that country Section I covers bacteriology, and Section II biochemistry There are two other parts on hematology and histology

The book covers well a big field It is clearly written, to the point, and avoids the annoying practice so common in many books of quoting innumerable references

ANDREW BABEY

The 1946 Year Book of Neurology, Psychiatry, and Neurosurgery Neurology edited by Hans H Reese, M D , and Mabel G Masten, M D Psychiatry edited by Nolan D C Lewis, M D Neurosurgery edited by Percival Bailey, M D Duodecimo of 732 pages, illustrated Chicago, Year Book Publishers, 1947 Cloth, $3 75

This is by far the best of all the year books published of this series Endocrinology no longer is included as a special division and has been replaced by neurosurgery The papers abstracted are thoroughly evaluated and the material is so rich that any attempt to emphasize specially any of the reports would require space not available for this review This is a book that should be on the shelves of every practicing physician of every specialty and would be a valuable source of information for the general practitioner

A M RABINER

The Medical Clinics of North America. New York Number May, 1947 Octavo Philadelphia, W B Saunders Company, 1947 Published Bimonthly (six numbers a year) Cloth, $16 net, Paper, $12 net

This issue contains an instructive compilation of material for the pediatrician as well as for the general practitioner The reviewer was impressed especially with the following articles "Meningococcemia", by Bakwin and Lecks, "The Employment of Gamma Globulin in Pediatrics", by Morris Greenberg, "The Management of Syphilis in Children", by Yampolsky, and "Feeding Difficulties", by Ruth Bakwin

The entire collection deserves careful reading, the subject matter is of a practical nature and is handled by men of experience who tell their respective stories in a direct way and to the point

HARRY APFEL

Rh Its Relation to Congenital Hemolytic Disease and to Intragroup Transfusion Reactions By Edith L Potter, M D Octavo of 344 pages, illustrated Chicago, Year Book Publishers, 1947 Cloth, $5 50

This book is devoted to a comprehensive study of the Rh factor and its relation to congenital hemolytic disease and to intragroup transfusion reactions The author is to be complimented on the full and discriminating collection of the loose ends of so vast a subject within the limits of this short treatise and at a time when the field is so beclouded with confusion There appears a tendency to over-dogmatism, in view of the lack of complete knowledge It will take a few years before all the data can be pieced together to form a clearer picture of the subject, presented in such scholarly fashion by the author

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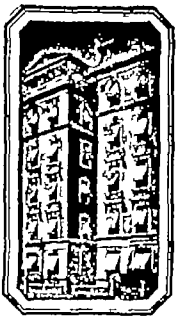
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[Continued from page 1635]

do not in our judgment detract from the main thesis, neither do they invalidate the conclusions

The report is indicative of the keen interest which the Committee on Public Health Relations has taken in the problems facing the Department of Mental Hygiene and of the thought given to them The soundness of the Committee's statements and recommendations is attested to by the Secretary of the Board of Visitors of one of the State mental hospitals, who has informed us that the report was read at a meeting of the Board whose members "were all tremendously interested" He requested that copies of it be made available to the Executive Board of the Association of Members of Boards of Visitors

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June 8, 1948

Hospital News

[Continued from page 1629]

PERSONALITIES

Appointed

Dr Frederick E Lane, as consultant in obstetrics and gynecology, St Alban's Veterans Administration Hospital, effective June 15 As chief of staff at Our Lady of Victory Hospital, Lackawanna, Dr Eugene M. Sullivan, succeeding his father, Dr Michael A. Sullivan To the active staff, Margaretville Hospital, Dr Robert Schatkin, Walton, Dr Charles Ives, Roxbury, and Dr G M Palen, Dr A Weinberg, and Dr F W Bruell, all of Margaretville

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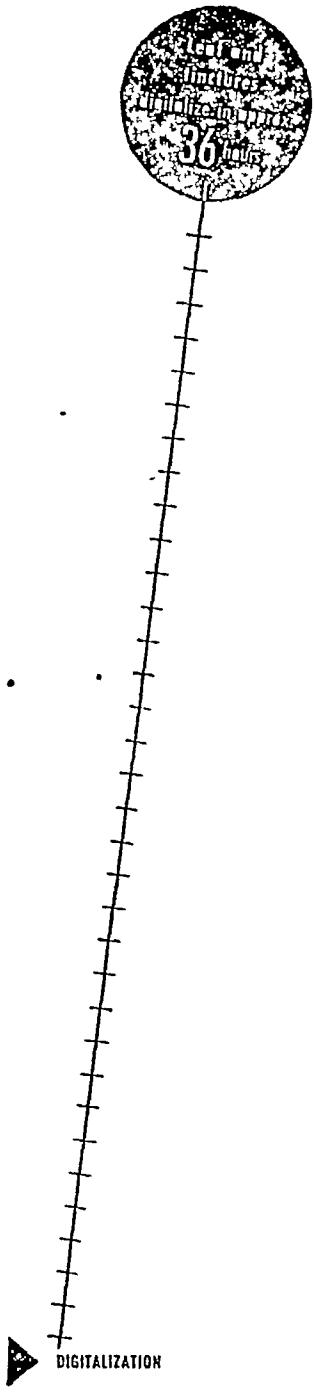
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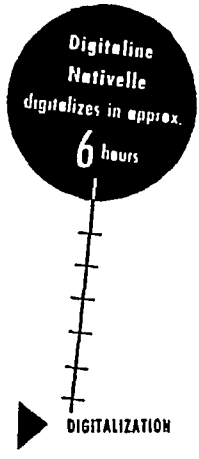
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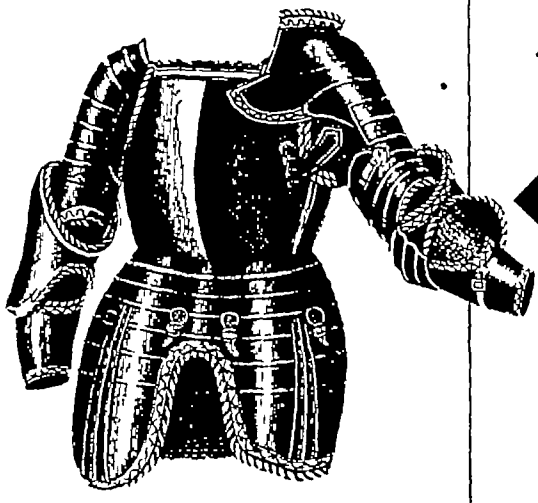
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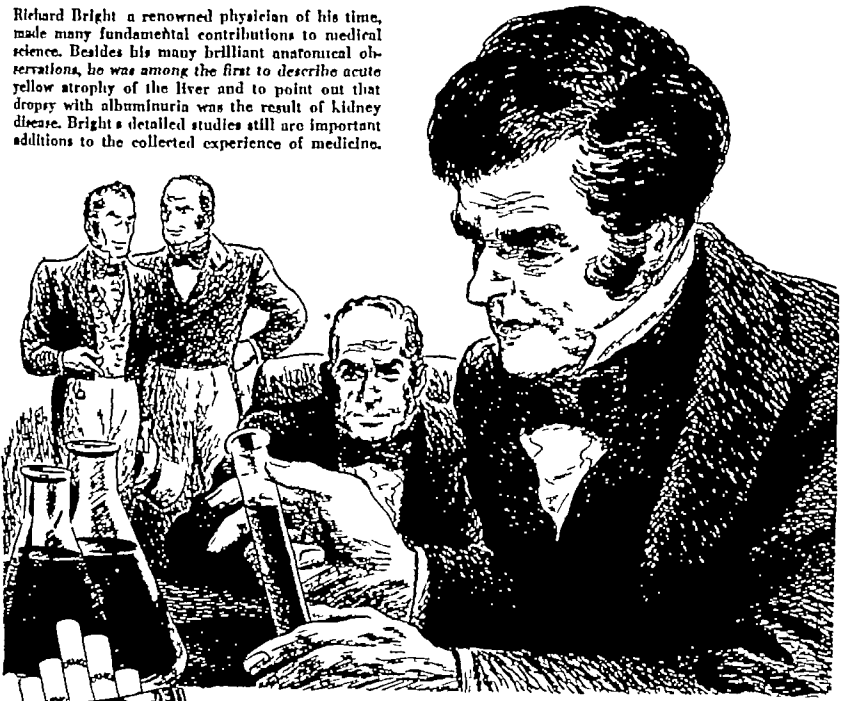
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CONTENTS

SCIENTIFIC ARTICLES

The Incidence of Pulmonary Tuberculous Spreads ' Following Thoracic Surgery and Anesthesia, *William M Parke, Jr, M D, Edward R Loftus, M D*, and *Harold F Bishop, M D* 1685

The Intrathecal Use of Pitressin for the Prolongation of Spinal Anesthesia, *Oscar H Stover, M D* 1689

Intravenous Procaine in the Management of the Injured Hand, *David J Graubard, M D, Milton H Waldman, M D*, and *Milton C Peterson, M D* 1693

Intravenous Anesthesia, *Paul W Searles, M D*, and *Rose M Lenahan, M D* 1699

Pulmonary Pathology as Related to Infant Resuscitation, *W Schwab, M D, H D Eastman, M D*, and *B Etsten, M D* 1703

Esophageal Intubation for Repair of Pharyngo-esophageal Diverticulum, *Richard N Terry, M D* 1709

(*Continued on page 652*)



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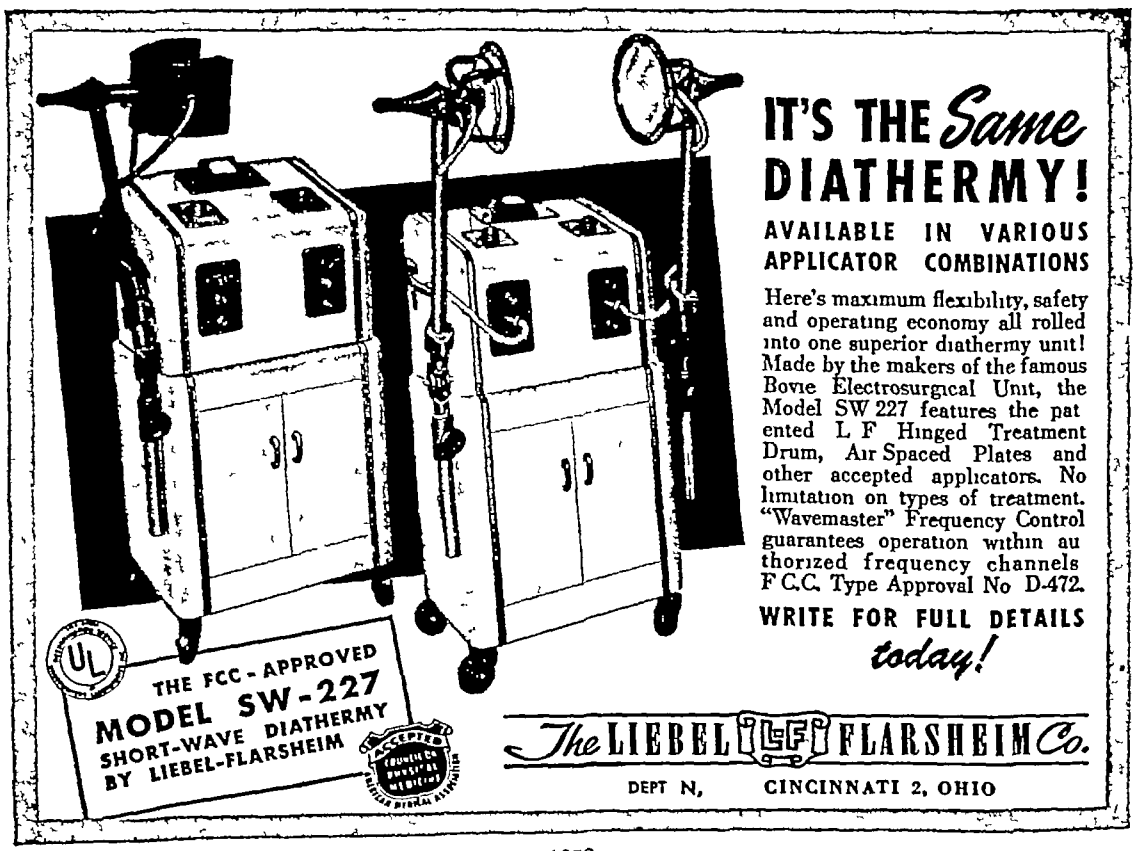
(*CONTENTS—Continued from page 1650*)

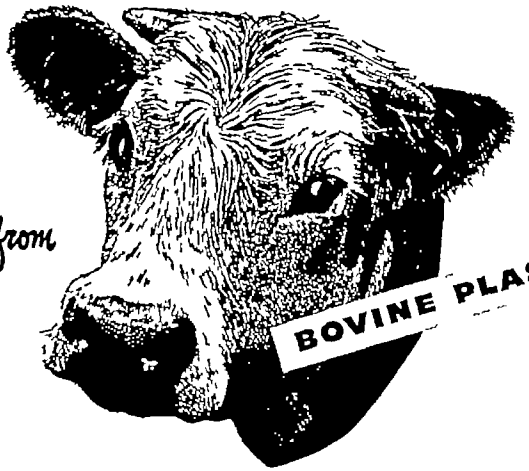
Studies on the Pharmacologic Properties of Procaine and Di-ethyl-amino-ethanol, *E M Papper, M D , Bernard B Brodie, Ph D , Philip A Lief, M D* , and *E A Rovenstine, M D* 1711
The History of Intercostal Muscular Paralysis as a Phenomenon of Anesthesia, *George Edgar Burford, M D* 1715
Treatment of Cutaneous Anthrax with Penicillin, *Joseph R Griffin, M D , Robert H Shanahan, M D* , and *Carmelo E DeAngelis, M D* 1718
Elusive Mental Cases, *B Liber, M D , F A P A* 1722
Hypertension A Manifestation of Hypertensive Vascular Disease, *George A Perera, M D* 1724
Some Contributions of Physical Medicine in Poliomyelitis, *Arthur L Watkins, M D* 1729
The Surgical Treatment of Advanced Carcinoma of the Cervix, *Alexander Brunschwig, M D* 1733
Clinicopathologic Conferences (*Bellevue Hospital*)
Bacterial and Virus Pneumonias 1735

EDITORIALS
Draft Boards Again 1681
Current Editorial Comment 1682

GENERAL FEATURES
Necrology 1740
Hospital News 1741
Medical News 1744
Woman's Auxiliary 1749

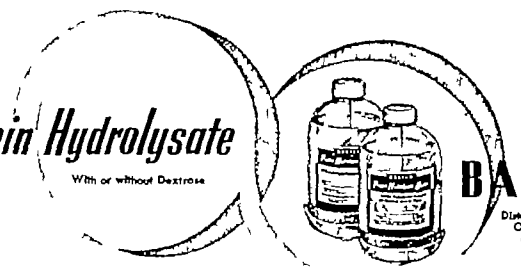
MISCELLANEOUS
State Society Officers 1654, 1656, 1658
Books 1752
County Society Officers 1756





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Report of the Committee on Therapy of

THE AMERICAN ACADEMY OF ALLERGY

on HYDRYLLIN

The results of the study

		60% to 100% EFFECTIVE (Regarded as "Good")	40% to 60% EFFECTIVE (Regarded "Fair")	0% to 40% EFFECTIVE (Regarded as "Poor")
Hay Fever	790 CASES	304 (38%)	234 (30%)	252 (32%)
Asthma	397 CASES	119 (30%)	82 (21%)	196 (49%)
Pollen Asthma	226 CASES	73 (32%)	55 (24%)	98 (44%)
Vasomotor Rhinitis	130 CASES	20 (16%)	42 (32%)	68 (52%)
Urticaria	24 CASES	4 (17%)	8 (33%)	12 (50%)
Eczema	3 CASES			3
TOTAL	1570 CASES			

Side Reactions

No Reactions	1,219 Cases (72%)
Moderate Reactions	314 Cases (20%)
Severe Reactions	126 Cases (8%)

Conclusion From these figures it would seem that the preparation has a fair degree of effectiveness in hay fever and asthmatic cases, both those with asthma due to pollen and those having asthma from other sources, the figures of the effectiveness of the drug are more impressive than those of other antihistaminics.

ON THE basis of the study made by the Committee on Therapy of The American Academy of Allergy, HYDRYLLIN is an effective and well tolerated antihistaminic for use in the treatment of allergic manifestations.

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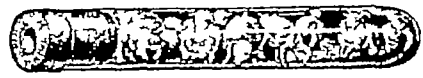
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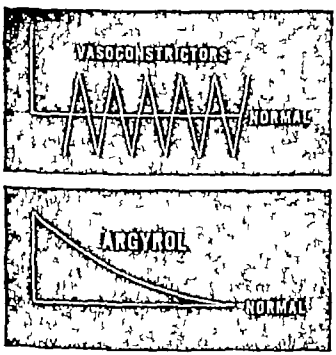
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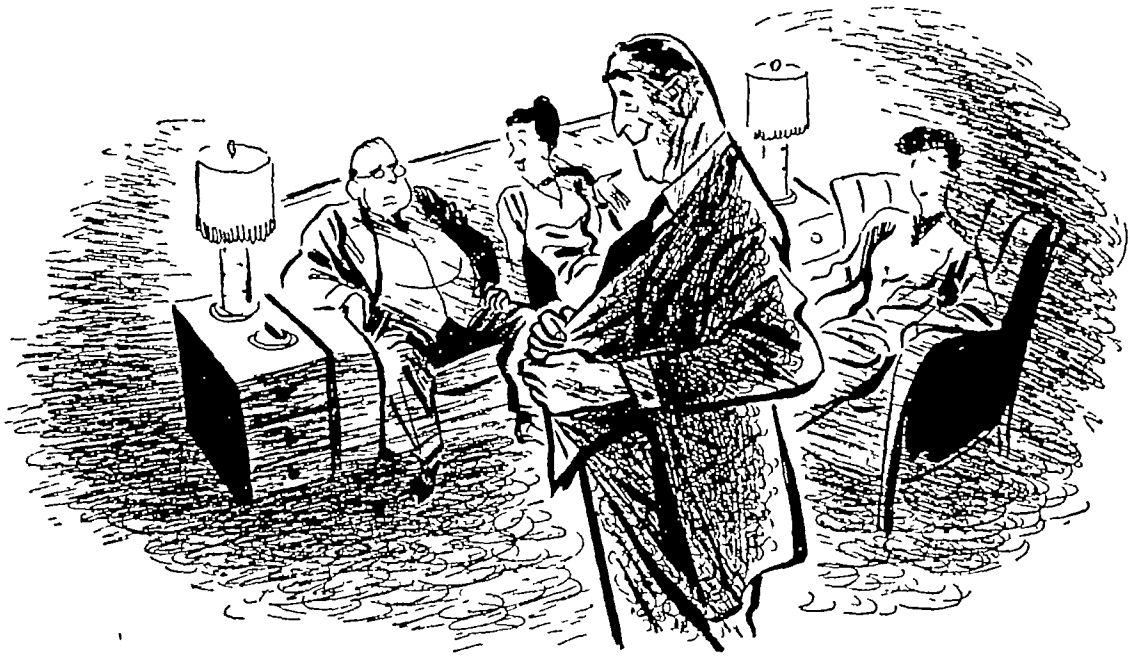


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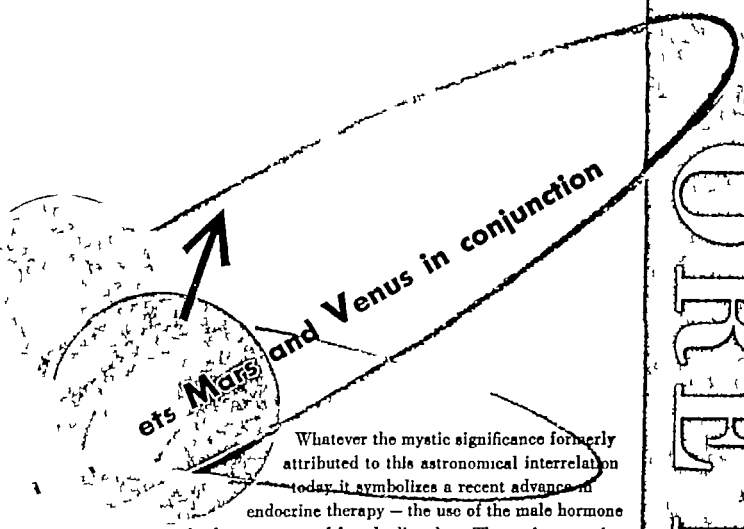
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ELIXIR:
20 mg per fluidounce

AMPOULES:
20 mg per cc

Specify **Desoxyn**® Hydrochloride

(d Desoxyephedrine Hydrochloride, Abbott)



Whatever the mystic significance formerly attributed to this astronomical interrelation today it symbolizes a recent advance in endocrine therapy — the use of the male hormone in the treatment of female disorders. The antiestrogenic action of the male hormone including its inhibiting effect on the uterine musculature facilitates control of gynecologic disturbances.

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METHYLTESTOSTERONE U.S.P XIII *tablets*

are effective — by mouth — in the management of dysmenorrhea and premenstrual distress functional uterine bleeding and the menopause In the puerperal patient ORETON M* relieves breast engorgement, abolishes after pains and inhibits lactation

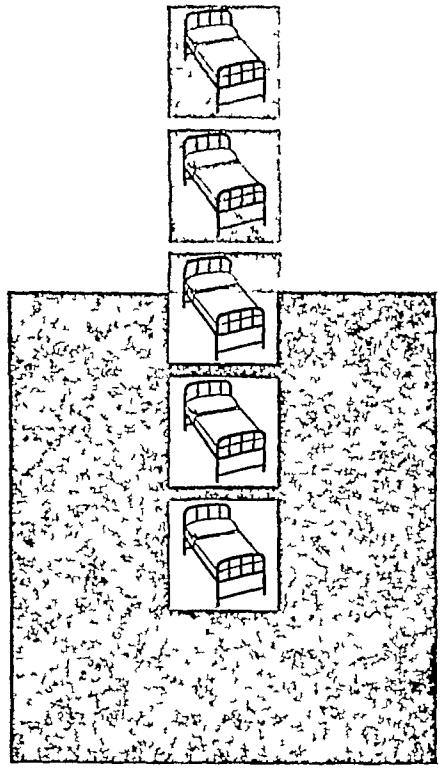
DOSAGE: *Dysmenorrhea and premenstrual distress* — Three 10 mg tablets or one 25 mg. tablet daily for 10 days preceding menses. *Functional uterine bleeding* — Three 25 mg tablets every other day for 3 or 4 doses to control bleeding *Menopause* — One 10 mg tablet or more daily Breast engorgement — Three 10 mg tablets daily for 2 or 3 days while continuing nursing *After-pains* — Three 10 mg. tablets at end of labor repeating in 8 hours if necessary *Inhibition of lactation* — Three 25 mg tablets twice daily for 2 days beginning immediately postpartum.

ORETON M Tablets of 10 mg in boxes of 15, 30 and 100; or 25 mg in boxes of 15 and 100

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Pelvicins*

[penicillin vaginal suppositories Schenley]

In a recent controlled study [1] of 1,573 obstetrical patients, the incidence of genital tract infections was reduced from 5 3 per cent to 2 3 per cent. when penicillin vaginal suppositories were used *A decline of 56 6 per cent!*

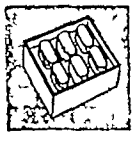
ADDITIONAL ADVANTAGES PELVICINS (penicillin vaginal suppositories Schenley) shorten the hospitalization period, reduce nursing care required, are completely painless and nonirritating These advantages suggest the value of their routine use in obstetrical procedure

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1 Pierce, R. R.: Am. J Obst. & Gynec. vol. 55 (Feb.) 1948.

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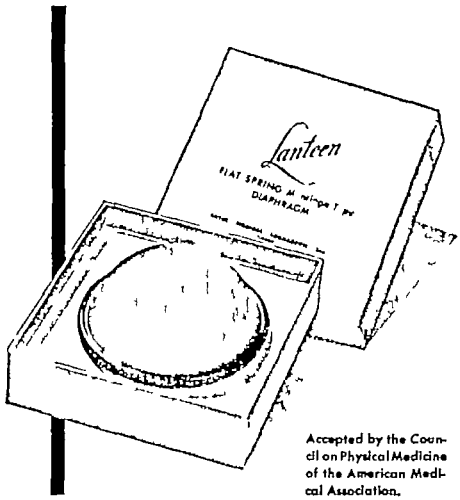
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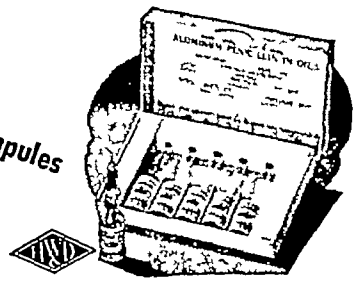
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Aluminum Penicillin in Oil 1 cc size ampules, 300,000 units per cubic centimeter

* Patent applied for

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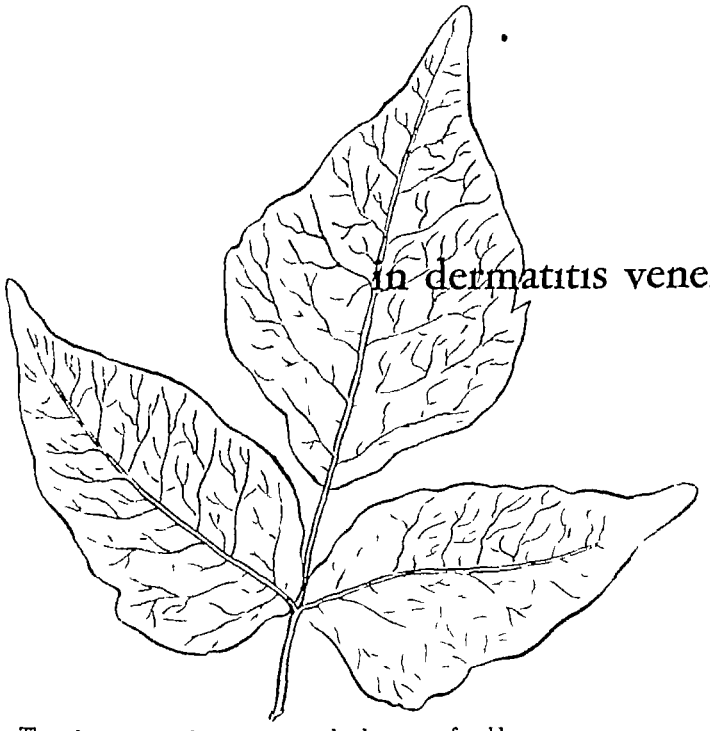


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INDEX TO ADVERTISERS

Abbott Laboratories	1662
Adlew Jewelers	1660
American Hospital Supply Corporation	1653
The Arlington Chemical Company	1656
A C Barnes Company	1661
Dr Barnes Sanitarium	1753
Bilhuber-Knoll Corp	1658
Brigham Hall Hospital	1755
Bristol Laboratories Inc	1751
Brown s Medical Bureau	175›
Brunswick Home	17›3
Ca Ma-Sil Company	1654
Certified Blood Donor Service	1660
Ciba Pharmaceutical Products Inc	2nd cover 1667
Commercial Solvents Corporation	1674
The De Leoton Company	1676
Doak Co Inc	1670
Eaton Laboratories Inc	1668
Falkirk in the Ramapos	1753
Otis E Glidden & Co Inc	1650
Greenwich Village Beverages Inc	1670
Halcyon Rest	17›5
Hoffmann-La Roche Inc.	1673
Holbrook Manor	1753
Homemakers Products Corporation	1672
Hynson Westcott & Dunning Inc	1666
Interpines	1753
Lanteen Medical Laboratories Inc	1665
The Liebel-Flarsheim Co	1652
Eli Lilly and Company	Between 1680-1681
Louden-Knickerbocker Hall Inc	1753
Mandl School	1755
The Maples Inc	1755
Mead Johnson & Co	4th cover
National Discount & Audit Co	1755
New York Life Insurance Company	3rd cover
Paine Hall	1755
Pinewood	1755
Raymer Pharmacal Company	1679
R J Reynolds Tobacco Co	1649
J B Roerig and Company	1651
Schenley Laboratories Inc	1664
Schering Corporation	1663
G D Searle & Co	1657
Sharp & Dohme	1680
Smith Kline & French Laboratories	1647 1659 1675 1758
Standard Pharmaceutical Co Inc	1660
Marvin R. Thompson Inc.	1671
Charles B Towns Hospital	1753
Upjohn Company	1669
William R Warner & Co Inc	1648
West Hill	1753
Winthrop-Stearns Inc	1655
Wyeth Incorporated	1677



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1 Downing J G Hanson M. C and Lamb M Use of 5-Nitro-2-Furaldehyde Semicarbazone in Dermatology J.A.M.A. *133* 299 1947 **2** Robinson, H M. and Robinson H M , Jr The Comparative Values of Some New Drugs in the Pyodermas South. M. J *40* 409 1947 **3** Miller J Rodriquez J and Domonkos A Evaluation of Penicillin in Topical Therapy New York State J Med. *47* 2316 1947 **4** McCollough N C Treatment of Infected War Wounds with a Nitrofuran Indust. Med *16* 128 1947



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1. *J. Canada M. A. J.* 44:263 (Mar.) 1941.
2. *J. So. Carolina M. A.* 44:117 (Jan.) 1948.

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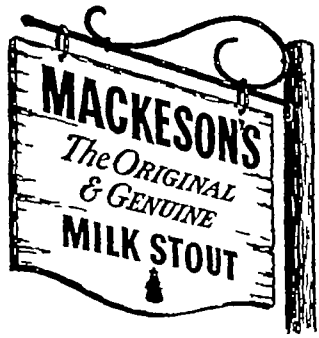
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Page 1757

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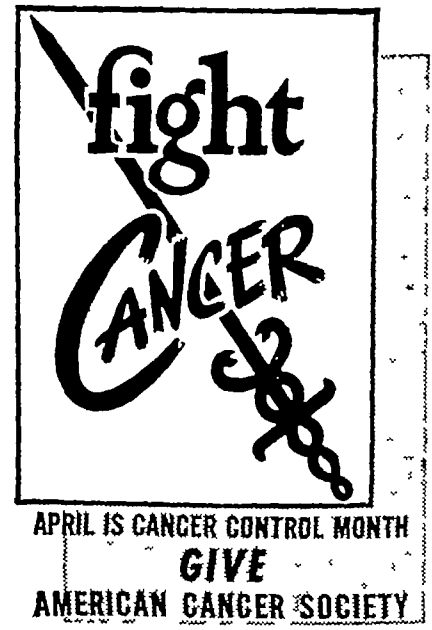




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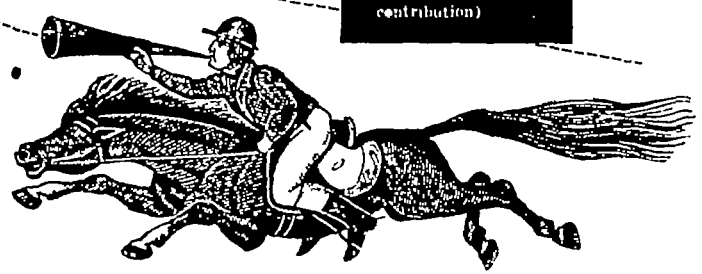
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[1]Shemin D., and Rittenberg D The Utilization of Glycine for the Synthesis of Porphyrin J Biol. Chem., 159:567 1945

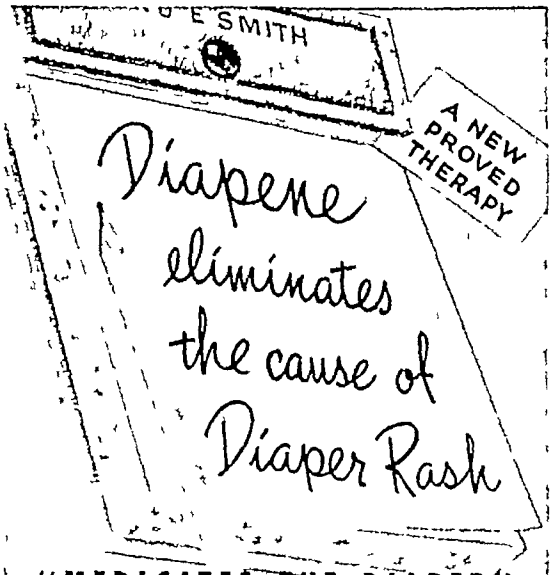
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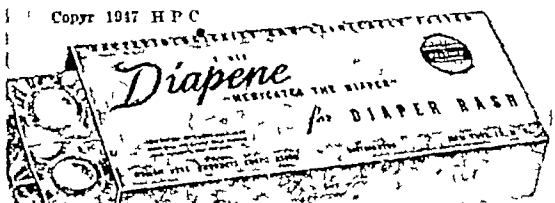
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INDEX TO ADVERTISED PRODUCTS

Aluminum Penicillin (Hynson, Westcott & Dunning, Inc) 1666
Aminoids (The Arlington Chemical Company) 1656
Antistine (Ciba Pharmaceutical Products, Inc) 2nd cover
Argyrol (A C Barnes Company) 1661
Baxter Solutions (American Hospital Supply Corporation) 1653
Ca-Ma-Sil (Ca-Ma-Sil Company) 1654
Desoxyn (Abbott Laboratories) 1662
Dexedrine Sulfate (Smith, Kline & French Labs) 1647
Diapene (Homemakers' Products Corporation) 1672
Diatrin (William R Warner & Co, Inc) 1648
Edrisal (Smith, Kline & French Labs) 1758
Eskadiazine (Smith, Kline & French Labs) 1659
Eskaphen B Elixir (Smith, Kline & French Labs) 1675
Ferrous-Glycinate-MRT (Marvin R Thompson, Inc) 1671
Furacin Dressing (Eaton Laboratories, Inc) 1668
Hydryllin (G D Searle & Co) 1657
Lanteen Diaphragm (Lanteen Medical Laboratories, Inc) 1665
Neo-Synephrine (Winthrop-Stearns Inc) 1655
Nucarpon (Standard Pharmaceutical Co, Inc) 1660
Obron (J B Roerig and Company) 1651
Ohodin (The De Leoton Company) 1676
Oreton-M (Schering Corporation) 1663
Paba Sodium (Wyeth Incorporated) 1677
Pelvicins (Schenley Laboratories, Inc) 1664
Pyribenzamine (Ciba Pharmaceutical Products, Inc) 1667
Ray-Formosil (Raymer Pharmacal Company) 1679
Salinidol (Doak Co, Inc) 1670
Soluthricin (Sharp & Dohme) 1680
Syrup Choline Bicarbonate (Commercial Solvents Corporation) 1674
Theocalcin (Bilhuber-Knoll Corp) 1658
Thephorin (Hoffmann-La Roche Inc) 1673
Zymacaps (Upjohn Company) 1669
ZymenoL(Otis E Glidden & Co, Inc) 1650

Dietary Foods

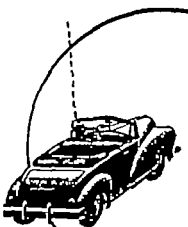
Milk Stout (Greenwich Village Beverages, Inc) 1670
Pablum (Mead Johnson & Co) 4th cover

Medical & Surgical Equipment

Diathermy Apparatus (The Liebel-Flarsheim Co) 1652

Miscellaneous

Chromograph (Adlew Jewelers) 1660
Cigarettes (R J Reynolds Tobacco Co) 1649
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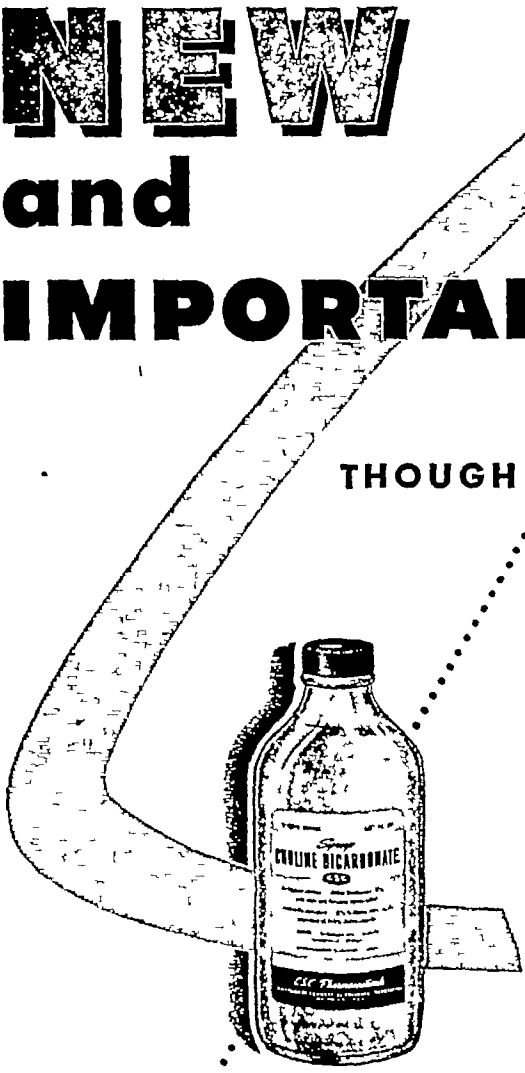
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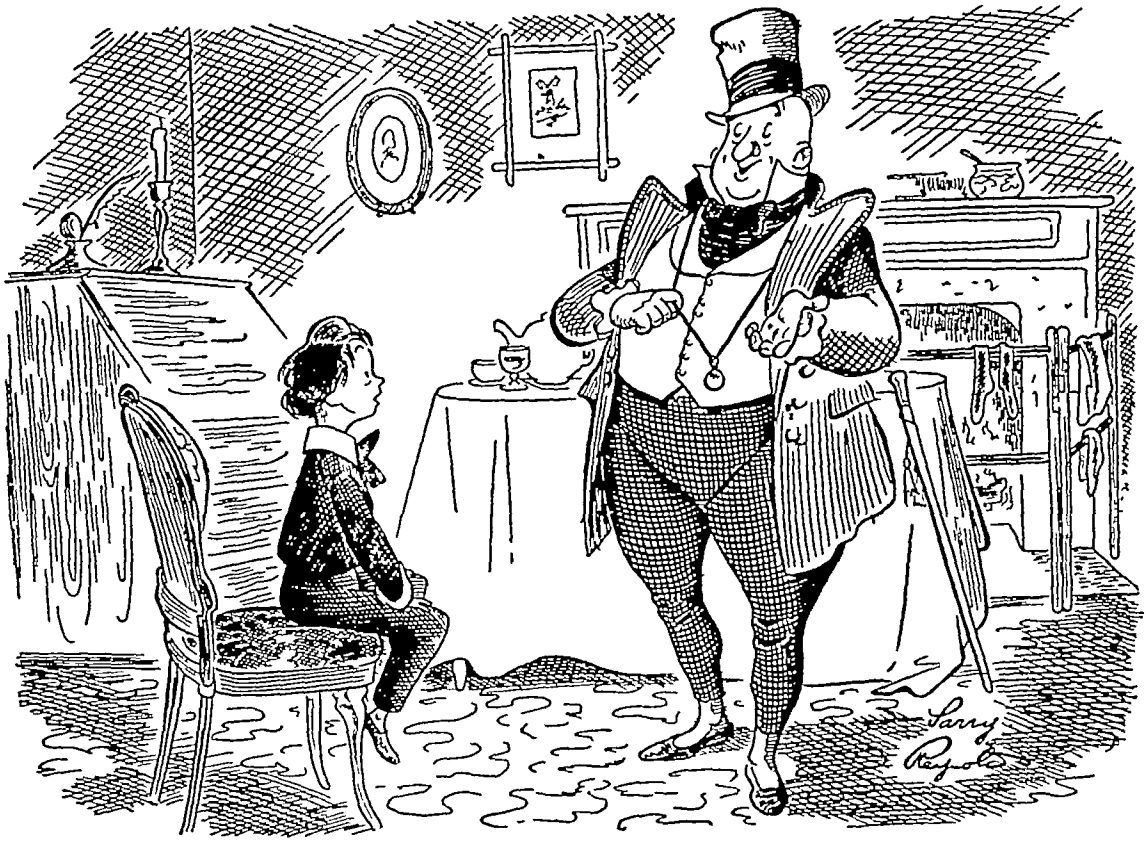


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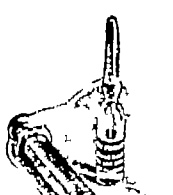
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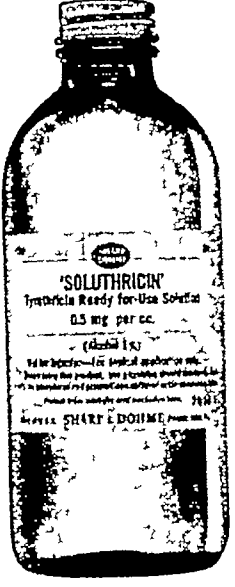
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VOLUME 48 AUGUST 1 1948 NUMBER 15

Editorials

Draft Boards Again

With the passage of the first selective service legislation to operate in the United States in a time of putative world peace (the selective service bill of September 7, 1940, was signed by President Roosevelt September 16, 1940, after the war in Europe was well under way, Poland having been invaded September 1, 1939), the physicians of this country will once again be called upon to implement the mechanism of the draft [1] Inductions will commence September 22 of this year, a date which precedes the start of the academic year of virtually all colleges All men of the ages of eighteen to twenty-six must register, probably in the month of August

> Proposals to extend the draft for physicians and dentists to age forty-five were not passed Yet there are few doctors available younger than twenty-six, and the draft contains provision stating that no person shall be inducted 'until adequate provision" has been made for medical care and hospital accommodations "[1]

In this day and age of super speeds and elaboration of mechanisms of all kinds, the public is made aware of the perfection of things, devices, artifacts, structures These things can be photographed pictorialized, described Especially with respect to medicine, there exists the tendency to overemphasize the importance of drugs, apparatus, buildings, and machinery and to minimize the essential—the doctor, the *deus ex machina*, who must prescribe intelligently, interpret the product of the apparatus knowingly, for instance the x ray film, and make the machinery of the draft of any value.

Once again the doctors of the nation are to be called upon far in advance of the date inductions will start, to provide that expert knowledge and skilled medical service without which recruitment for the National

[1] New York Times, June 28 1948, p 6

Guard and the processing of selectees for the armed forces would be useless Technical personnel can take x-ray pictures, electrocardiograms, give enemas and hypodermic injections, make electroencephalograms, operate diathermy machines, and do laboratory procedures, but, to interpret all these things in terms of health or morbidity, there is no substitute for the doctor, and the better trained and more experienced the doctor, the better it will be for all concerned

We hope that this will be emphasized in the new selective service program and be brought home to the families of the nation

Current Editorial Comment

Chemical Tests for Alcoholic Intoxication The too common practice, by those on duty in responsible positions often involving the use of machines in industry or on the highways, of drinking alcoholic liquor has raised many questions When is one drunk? At what point does it cease to be amusing comedy and become instead potential tragedy? What are the certain signs and symptoms of drunkenness? What is a good definition of "under the influence of intoxicating liquor?" Are there tests and established standards that point the way to answers? In a recent issue of *Industrial Medicine*, R N Harger brings together the latest data on this live subject [1]

Interesting bits of information include the following (1) normal body alcohol is infinitesimal and may be disregarded, (2) from the gastrointestinal tract of dogs, the absorption of alcohol is more than half complete in 15 minutes, and complete in two hours, (3) in the body, alcohol is stored in proportion to the water content of each tissue, (4) more than 90 per cent of this stored alcohol is burned by the body to carbon dioxide and water, less than ten per cent is excreted in the urine, sweat and breath, (5) the average adult can destroy in the body about one-third fluid ounce of pure alcohol per hour, (6) while the effects of alcohol on the digestive tract, heart, liver, kidneys, muscles, and the blood vessels of the skin are important, the chief effect is depression of the central nervous system With increased concentration of alcohol in the brain, the following stages of central nervous system depression may be recognized (*a*) impaired judgment, (*b*) muscular incoordination and more marked loss of self control, and (*c*) marked central nervous system depression ranging from slight stupor to surgical anesthesia

As in serious or fatal cases of poisoning with any one of many drugs, it has become the established practice, indispensable to accurate diagnosis, to determine the amount of the drug or poison in various tissues, so also it has become the accepted practice to test for alcohol the tissues of those suspected of intoxication This substitutes facts for opinions The facts are useful in confirming well based opinions In 1935, the Arizona Supreme Court gave a definition which has been copied by many other state courts "The expression 'under the influence of intoxicating liquor' covers not only all the well known and easily recognized conditions and degrees of intoxication, but any abnormal mental or physical condition which is the result of indulging in any degree in intoxicating liquors, and which tends to deprive him of that clearness of intellect and control of himself which he would otherwise possess If the ability of the driver of an automobile has been lessened in the slightest degree by the use of intoxicating liquors, then the driver is deemed to be under the influence of intoxicating liquor The mere fact that the driver has taken a drink does not place him under the ban of the statute unless such drink has some influence upon him, lessening in some degree his ability to handle said automobile"

With that definition in mind, the American Medical Association Committee on Street and Highway Accidents and the National Safety Council's Committee on Tests for Driver Intoxication made careful studies of the interpretation of the results of these chemical analyses Both committees followed three general principles (1) chemical tests should protect not only the nondrinker, but also the mild drinker who has not imbibed enough to be definitely affected, (2) any errors should favor the person being tested, and (3) allowance

[1] Harger R. N Industrial Medicine 17 52 (February) 1948

must be made for the fact that some people "carry their liquor" better than others In accordance with these principles, the committees selected two points in the blood alcohol scale 0 05 and 0 15 per cent (50 mg and 150 mg per 100 cc) Those two points divide drinking drivers into three groups, or zone I, zone II, and zone III The recommendations of the committees for the three zones are as follows Zone I, with a blood alcohol of 0 0 to 50 mg per 100 cc , shall be considered prima facie evidence that the driver is not under the influence, Zone II, with a blood alcohol of 50 mg to 150 mg per 100 cc —some drivers will be under the influence, but not all Here the recommendation is that the evidence be considered relevant, but not prima facie, and Zone III, with a blood alcohol above 150 mg per 100 cc , shall be considered prima facie evidence that the driver is under the influence With concentrations of blood alcohol of 400 mg per 100 cc most people would be unable to drive at all, and 500 mg per 100 cc is near the lethal point

Of two methods to determine the level of body alcohol, the first is a laboratory procedure in which the distillate from a body material is oxidized with dichromate in 1 1 sulfuric acid, and the excess of dichromate then titrated with a red reducing fluid containing methyl orange and ferrous sulfate in the same concentration of sulfuric acid The method has a sharp end point, possesses a good degree of accuracy and has been widely used The scarcity of trained chemists in most police departments, however, prompted the author and his coworkers to develop a simple method of testing the alcohol content of the breath It is a portable apparatus, jokingly called a "drunkometer," in which the expired air is allowed to bubble through a purple fluid composed of 1 cc of twentieth normal potassium permanganate in 3 4 sulfuric acid The purple fluid absorbs all alcohol from the breath, reacting quantitatively with the alcohol at room temperature The volume of alveolar air is measured by simultaneously determining the carbon dioxide, since normal alveolar air contains close to 5 5 per cent of carbon dioxide The alcohol content of 2,000 cc of alveolar air is equal to that in 1 cc of blood

Testing subjects for steering and braking, Newman of Stanford University found those with blood alcohol above 150 mg per 100 cc showed decreases of skill ranging from 16 to 24 per cent Goldberg of Sweden found universal detrimental effects of blood alcohol above 150 mg per 100 cc , and definite adverse effects with concentrations considerably below that point The studies of Holcomb at Northwestern University show that a driver with a blood alcohol in zone III (above 150 mg per 100 cc) has increased his probability of an accident fifty-five-fold, on the average

Where Is It? $10,200,800,000 has been paid into the Social Security Administration in eleven years and $849,000 000 collected in interest Benefits paid total $1,689,600,000 and administrative costs $246,000,000 The kitty remaining is over nine billion Where do you suppose it is?—*From the News Letter, American Medical Association, April 8, 1948*

There Is a Need A report from the New York State Nurses Association calls attention to the lamentable need for men nurses in the profession The covering letter states, "We believe that the survey shows that more young men should be recruited into the profession of nursing" With this conclusion we agree

World War II has acquainted all ranks of life with the fact that men are as capable of looking after men as women are, and, in many instances, far better qualified to do so

We are constrained to point out that the nursing profession starts out with a handicap It is, in the public mind, a unisexual profession In the dictionary's order of definition a nurse is primarily a "wet nurse." Secondarily, a nurse is the woman employed in a nursery to keep squalling brats in order She then ministers, with various good offices at the bedside of the dying In every one of these capacities, she is a woman The few instances, with some reservations, in which a man is employed in a nurse s capacity are in insane asylums, in this case he is hired because of his superior physical strength A profession handicapped with such a title is not likely to appeal to a normal man He

will not wish to bear a title that suggests that he is either a woman or a bruiser

In the armed services it is less embarrassing, when in need of the attention that the early hours of the morning call for, to shout for "Sister," rather than for "Miss" or "Lieutenant" Such ministrations should be as impersonal as possible, and, after a few tries, "Sister" comes trippingly off the tongue

The report points out that in the nursing profession, as in many another, men were the first practitioners They were friars who left their monasteries to go into the highways and byways to seek out and minister to the sick They brought them into the shelters that they could provide Such were known as "hospices," later as "hospitals," or "friendly places for the reception of guests" The friars were known as "Brothers"

We do not think men can be recruited to the ranks of nursing by reverting to their medieval appellation of "Brother" However, most of our readers will probably agree that few men will wish to enter a profession in which they are called "Nurse"

The nursing profession is as firmly entrenched in the hands of women as the medical profession, fifty years ago, was in the hands of men Men have let the bars down, at least to a certain extent, to women In the case of the nursing profession we urge women to do likewise There are many things that men can do for men that women cannot We submit that certain sex prejudices are not only right but proper There are services that men only should do for men Everyone who served in the recent war will testify to what the Medical Corpsmen, under the direction of their women officers, did for the sufferers of their own sex

The profession of a male nurse should fill many wants that are now outstanding Training should lead to continual advancement in his profession provided the candidate engaging in it comes in contact with men and women of sympathetic comprehension

The problem is one for the New York State Nurses Association Admit men to work with you on equal terms, invent a title for them that does not make them feel inferior, and you will have done something real for the improvement of society

MEDICAL SOCIETY OF THE STATE OF NEW YORK

1948 District Branch Meetings

Date	*Branch*	*Place of Meeting*	*Time*
September 14	Fifth	Watertown	Afternoon and evening (dinner)
September 16	Eighth	Batavia	Afternoon and evening (dinner)
September 23	Third	Parrott House, Schoharie	Morning and afternoon (luncheon)
September 24 and 25	Fourth	Saratoga Springs	Friday afternoon, Saturday morning (dinner Friday evening)
September 30	Seventh	Veterans' Hospital, Canandaigua	Morning and afternoon (luncheon)
October 6	Sixth	Binghamton	Afternoon and evening (dinner)
October 20	Second	Garden City Hotel, Garden City	Morning and afternoon (luncheon)
October 26	First	Newburgh	Afternoon and evening (dinner)

Scientific Articles

THE INCIDENCE OF PULMONARY TUBERCULOUS "SPREADS" FOLLOWING THORACIC SURGERY AND ANESTHESIA

WILLIAM M PARKE JR M D * EDWARD R LOFTUS M.D , and HAROLD F BISHOP, M D , Valhalla, New York

(From the Divisions of Anesthesiology and Tuberculosis, Grasslands Hospital)

IN A previous report, the effects of anesthesia and surgery on patients with pulmonary tuberculosis were analyzed in reference to postoperative dissemination of the pulmonary disease [1] Two hundred eighty two anesthetic administrations for nonthoracic procedures were studied The incidence of postoperative spread was found to be 10 9 per cent.

This paper is a similar statistical review of the incidence of pulmonary tuberculous spreads following thoracic surgery Figures will be stated in reference to patient groups However most of the statistical percentages were determined on the basis of numbers of operations (rather than numbers of patients) Eight hundred five anesthetic administrations were performed on 367 patients between the years 1932 and 1947 in one hospital All the procedures were done on patients with active, moderately or far advanced, cavitary disease.

The criterion selected for determining the presence of a spread of the disease in the lung is x-ray evidence of an infiltration that persists or progresses over a period of at least a month postoperatively This criterion has been employed in the entire study Sputum volume and bacillary count are inaccurate measurements of the presence or extent of dissemination. The beginning collapse of tuberculous cavities, in which large numbers of organisms are present, and the resultant emptying of these cavities increase, at least temporarily the sputum volume and the Gaffky count. This response may be transient. Persistently positive sputum for several months into the postoperative period may indicate dissemination or residual cavitation These responses have been considered indicative of dissemination, but the correlation between effect and significance has caused them to be discarded on the basis of inaccuracy

Literature

In the past a great deal of controversy has existed regarding anesthesia for patients with pulmonary tuberculosis particularly those with active disease such as the patients who present themselves for thoracoplasty

Prejudice has existed against the use of ether in this regard. Apparently, the basis for that prejudice against ether for such patients arose from papers written three decades ago and were based on observation of open cone or drop ether Beecher has amply pointed out that the prejudice against ether is unwarranted and that three groups of workers have attacked this problem experimentally, and not one was able to substantiate the prejudice against ether [2]

Very little has appeared in the literature regarding dissemination of pulmonary tuberculosis following surgery The four following authors have mentioned this complication in relation to thoracoplasty

In 16 (10 7 per cent) of the 150 patients undergoing 430 thoracoplasties, Harrison and Berry found that there was some degree of spread of the disease following operation (accounting for two deaths) and a total of eight deaths during several months postoperatively [3] They state that the majority of these spreads were transitory that four spreads were ipsilateral, nine contralateral, and three not stated In 1941 Adams and Dufault observed 12 pulmonary exacerbations (4 9 per cent) within two months of 241 consecutive thoracoplasties [4] Seven were ipsilateral, and five were contralateral. In three of these cases, contralateral disease was present preoperatively Schaffner and Found, in discussing their use of spinal anesthesia for 335 thoracoplasties encountered ten postoperative spreads (3 per cent) [5] Eight of these spreads occurred in the

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* By invitation.

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opposite lung, and two occurred in pre-existing disease In 1941, Cullen and his associates reported on their experiences with nitrous oxide anesthesia for 148 thoracoplasties on 73 patients [8] Two spreads (1 4 per cent) and two deaths occurred in this small series

Spreads

In this series of 805 procedures, 81, or 10 per cent, showed evidence of various degrees of spread in the postoperative period Eleven of those that spread died within a month following operation because of the spread Twenty-eight had extensions of major proportion, while another 19 showed slight but definite evidence of dissemination The remaining 23 had x-ray evidence of spread within one month which began to clear shortly thereafter

Tubercle bacilli were found to be present in the sputum at the time of operation 609 times (75 6 per cent) Of the 81 instances of spread, 74, or 91 3 per cent, had positive sputum at the time of operation In other words, 74 spreads occurred following 609 operations on patients with positive sputum, an incidence of 12 per cent Seven spreads occurred following 196 operations in patients with negative sputum, an incidence of 3 6 per cent

A slightly higher incidence of spread is noted in men than in women Ten and six-tenths per cent of the men showed postoperative dissemination, while 9 3 per cent of the women spread

A review of racial distribution revealed that most of the patients are white, with an incidence of spread of 8 8 per cent The Negro patients made up 16 per cent of the total number and had a higher incidence of spread (18 9 per cent) Also, it was observed that the spreads found in the Negro group were more extensive and of a more malignant character Only eight Oriental patients were in the series Three of these spread in the postoperative period

Postoperative Deaths

In the entire series, 27 patients (3 3 per cent) died in the postoperative period (up to forty-seven days) No patient died during operation In 11 of these cases, extension of the pulmonary tuberculosis was considered the cause of death In this group, death occurred from the third to the forty-seventh postoperative day All but two of these had positive sputum at the time of operation and developed bronchogenic spreads, usually massive in character The two patients with negative sputum developed hematogenous dissemination, which caused tuberculous meningitis in one case and generalized miliary tuberculosis in the other, and death occurred approximately five weeks postoperatively in each case The next largest group, five, died in shock on the first to the third postoperative day Four of the five deaths in this category occurred over ten years ago, when blood was not readily available and oxygen was not used routinely postoperatively Three patients developed bronchopneumonia and died within one week

The remaining eight patients died as a result of various complications, as follows

1 One patient had a sudden hemorrhage into the bronchotracheal tree, causing obstruction eight hours postoperatively

2 One patient developed a gradual obstruction of the bronchotracheal tree with mucopurulent material in spite of persistent endobronchial aspiration The patient refused to cough and died on the fourth postoperative day

3 Sudden death in one patient on the sixth postoperative day was due to pulmonary artery thrombosis

4 A sudden fatal hemorrhage in one patient occurred on the forty-first postoperative day caused by erosion and rupture of the left axillary artery

5 One patient developed pulmonary edema on the third postoperative day, and in spite of therapy he expired on the eleventh postoperative day

6 One patient developed mediastinal emphysema, most marked on the fifth day, which failed to respond to treatment This patient died on the tenth postoperative day

7 One patient died on the fourth postoperative day with marked paradoxical respiration and mediastinal herniation following the resection of five ribs

8 One patient with poor respiratory reserve developed marked dyspnea, refused oxygen therapy, and died on the twenty-sixth postoperative day

Chronologic Review

As it has been stated, 805 major thoracic surgical procedures were carried out on patients with pulmonary tuberculosis in the sixteen-year period from 1932 through 1947 A majority of these (755) consisted of various stages of thoracoplasty, while the remaining 50 included lobectomies, cavernostomies, thoracotomies, and extrapleural pneumothorax

Thirty-six different combinations of anesthetic agents and technic were employed Many were tried only once or twice and were discarded because they were not safe, adequate, or satisfactory in some respect In general, four definite phases of anesthesia procedure may be seen in reviewing this series

The first phase lasted four years (1932 to 1935), during which time 158 procedures were done Local anesthesia alone was used at first, but soon this was used in conjunction with nitrous oxide and/or avertin, and by the end of this period the local infiltration was eliminated except occasionally when it was used alone for "poor risk patients." The incidence of spread in this period was 9 5 per cent.

In the second phase, lasting two years (1936 to 1937), 113 operations were recorded Cyclopropane was introduced and used with avertin on most of these occasions Also, for the first time in this series, endotracheal tubes were employed. Eight and eight-tenths per cent showed spread in the immediate postoperative course in this two-year period

In the third phase, which lasted eight years (1938 to 1945), 410 operations were performed with an incidence of spread of 10 0 per cent. Although there were some variations, inhalation technic employing an endotracheal tube and cyclopropane was the anesthesia for most of these procedures It was at the midpoint in this eight-year period that the hospital opened its own blood bank and blood became more readily available. Up until this occurred, patients were often transfused preoperatively in preparation for surgery, but no blood was given postoperatively or during operation, unless other attempts at replacement failed. Since that time, blood has been made available to the patients not only preoperatively but has been administered during and after operation

The fourth and last phase of this chronologic review lasted two years (1946 to 1947) and includes 124 procedures. The change in anesthesia which typified this particular period was the use of ether as the chief agent for maintenance during surgery following a cyclopropane induction. Endotracheal tubes were used routinely The use of intravenous procaine during and after operation was initiated in this period to afford relief from postoperative pain with retention of cough reflex. The incidence of spread during the immediate postoperative course in this two-year period was 8 per cent.

Anesthesia

Thirty-six different combinations of anesthetic agents and technics were employed Seven hundred eighty three were general in type, while 22 were regional or local without any supplementary general anesthesia. No spreads occurred in the latter group

Endotracheal tubes were used in 494 anesthetic administrations with an incidence of 10 9 per cent spread. No tube was employed in the remaining 289 general anesthetics. In this group, the incidence of spread was 9 3 per cent

Anesthetic drugs used included cyclopropane, avertin, nitrous oxide, ether, ethylene, chloroform, sodium pentothal, evipal, and procaine.

In an effort to determine which agent, if any, was associated with a particularly high incidence of spread of the pulmonary disease, the anesthetic drugs were considered separately The following analysis indicates the number of times that a particular drug was used alone or in conjunction with other agents

Cyclopropane was used 598 times with an incidence of 10.2 per cent spread. Avertin was used 221 times with an incidence of 11.3 per cent spread. Nitrous oxide was used 168 times with an incidence of 10 0 per cent spread Ether was used 107 times with an incidence of 5 6 per cent spread. Procaine (local, etc) was used 117 times with an incidence of 11 1 per cent spread The remaining agents, ethylene, chloroform, sodium pentothal, and evipal were used too seldom to evaluate their effects

Summary and Conclusions

1 An analysis of 805 anesthetic administrations for thoracic surgery in the treatment of pulmonary tuberculosis is presented

2 These procedures were completed during the sixteen-year period from 1932 to 1947

3 Chronologically, the series fell into four phases, each characterized by a particular form of anesthesia. These phases and results are described

4 In an effort to determine whether postoperative pulmonary disseminations are related to the use of specific drugs or technics, these various factors were analyzed and the results are presented

It was found that 10 per cent of the entire series of anesthetic administrations showed evidence of varying degrees of dissemination, although there was no appreciable difference in the percentage of dissemination between men and women. However, the incidence of spread in Negroes was approximately twice that found in white patients.

5 The predominant number of spreads were found among those patients with tubercle bacilli in their sputum at the time of operation

6 No particular anesthetic drug or technic was found to be responsible for spread

7 The incidence of pulmonary tuberculous spreads following 805 thoracic operations was found to be the same as the incidence following 282 nonthoracic procedures in patients with pulmonary tuberculosis

Discussion

Edward R. Loftus, M D ,*Valhalla (By invitation)* —Patients undergoing thoracic surgery do, of necessity, accept a greater risk of dissemination than in other types of procedures The most common form of dissemination is bronchogenic This form of extension is facilitated by overmedication preoperatively with loss of cough reflex and pooling of infected secretions to the dependent, healthier lung The position that must be assumed by the patient on the operating table allows drainage, carrying infected sputum, to the healthier lung The early popularity of local anesthesia was in great part due to preservation of the cough reflex

The presence of secretions, which may be appreciably increased postoperatively following collapse of cavitational disease, is a most important reason for bronchogenic dissemination Thus, the special importance of frequent suction during surgery with complete evacuation of the tracheobronchial tree postoperatively, preferably by endotracheal tube or by bronchoscopic means, is realized

There is another mechanism in operation which is not emphasized as much as these well-known factors The risk of dissemination is also dependent in part upon altered respiratory physiology and changes in the mechanics of respiration With the loss of a portion of the thoracic cage, there is present in every case some degree of paradoxical respiration The intrapulmonary pressure in the diseased lung is transiently decreased over that of the contralateral lung at the beginning of expiration There is also a lag of air flow to this region on both inspiration and expiration, which is attributed to the lack of support of the chest wall

This allows infected material to be carried farther out into the pulmonary parenchyma With the loss of normal lung resiliency due to disease, therefore, neither expiration nor inspiration will facilitate expulsion of infected sputum If the mediastinum is labile and the chest wall firmly supported, wide fluctuations of the mediastinum may occur, resulting in flutter or pendulum breathing This tends to diminish the ventilatory efficiency of the healthier lung, placing it under greater strain and allowing infected sputum to remain in the bronchial tree even in the presence of an active cough reflex In reality this process is a problem for the surgeon It functions dangerously only when the chest wall loses its support after the resection of more than four ribs

The type of anesthesia apparently does not play a major role in the cause of dissemination Ether has been condemned by some on the basis that it markedly increases the amount of secretion The incidence of postoperative dissemination has been variously quoted from 4 to 15 per cent In a recent report of the Veterans Administration, the incidence of extension of pulmonary tuberculosis in moderately advanced and far-advanced disease on bed rest alone was approximately 8 per cent Therefore, an overall percentage of 10 per cent would warrant the risk when the possibility of complete control of the disease now approaches 85 per cent

In the chronologic review of thoracic surgery and anesthesia over the past sixteen years, the major advances have been in technic

Perhaps now another phase has been entered in which the emphasis will be placed upon preoperative and postoperative use of streptomycin in selected cases This drug will probably alter the existing percentages of dissemination to some degree It should not, however, be used routinely in preparation for thoracoplasty It has been shown that 90 per cent of patients operated had not had postoperative dissemination, and it would appear unwise to use a drug with limited value and toxic manifestations and run the risk of developing a resistant strain of organism when the use of the drug may be valuable at a later date

However, streptomycin appears to have a definite place in the control of exudative disseminations before surgery and in those instances in which a spread may occur postoperatively

References

1 Parke W M., Jr , Loftus E R. and Bishop H. F New York State J Med 47 21 (Nov 1) 1947
2 Beecher, H K., and Adams, R. J A. M A. 118 1205 (Apr 14) 1942
3 Harrison A. W , and Berry, F B J Thoracic Surg 12 292 (Feb) 1943
4 Adams, R. and Dufault, Paul J Thoracic Surg 11 43 (Oct) 1941
5 Schaffner V D , and Found, E M J Thoracic Surg 12 190 (Oct.) 1942
6 Cullen S C , McQuiston, W O , and Petersen V W Anesthesiology 2 310 (May) 1941

ARMY SYPHILIS RECORDS

The Veterans Administration has in its custody the majority of syphilis records of those Army personnel who were treated for this disease while in active service and in many instances can procure informative data from the syphilis records of other than Army personnel. It is thought that many physicians treating veterans for syphilis as private patients would find a résumé of the syphilis record useful, since the details of treatment, results of spinal fluid examinations, and blood serologies are incorporated in the records Résumés of these records are available to physicians who are treating such veterans, provided authorization for the release of the data is given by the veteran Requests for the résumés, accompanied by an authorization for the release of the data, dated and signed by the veterans, should be addressed to the Dermatology and Syphilology Section, Veterans Administration, Munitions Building, Washington 25, D C It is most important that the veteran's service serial number and other identifying information, such as the date of enlistment, the date of discharge, rank, and organization be included

Ordinarily, the résumés can be furnished in approximately two weeks from the date of the receipt of the request and signed authorization

THE INTRATHECAL USE OF PITRESSIN FOR THE PROLONGATION OF SPINAL ANESTHESIA

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THE ATTEMPT to find a drug which may be added to a solution of a local anesthetic to prolong its action is certainly not new From the very early days of local anesthesia it was soon apparent that this was a desirable attainment The anesthetic action of a solution may be prolonged by any means which delays its absorption from the area in which it has been placed

The most obvious way to accomplish this was by mechanically decreasing the blood supply to the area In the case of the extremities this could be done through the use of a tourniquet In other locations it was far more difficult to accomplish Also this method was unpleasant for the patient and tended to engorge the operating field

At one time, local applications of cold, produced by an ethyl chloride spray, were successfully used to prolong cocaine anesthesia This was merely another way of reducing the blood supply to a certain localized area, thus keeping the solution concentrated in the locale where it was injected Not only was the action of cocaine lengthened, but a decided increase in its action was produced Wiener, Schleich, and others used this method to produce anesthesia for the extraction of teeth It was also discovered that under these conditions more dilute solutions could be used

Another way to lengthen the effect of a local anesthetic is to add some substance to the solution which will delay absorption of the drug Braun used suprarenin in 1903 to lengthen anesthesia and reduce toxicity It produced an area of local anemia, thus delaying the absorption of the anesthetic solution, thereby increasing its length and also reducing its toxicity In Shield s English translation of Braun s work *Local Anesthesia*, many of these early experiments are described [1] In summing up the results of his experiments Braun says that the anesthetic properties of novocaine are enormously increased by the addition of suprarenin

To anyone who administers spinal anesthesia, the period of action of the drug used often becomes the factor determining whether or not spinal anesthesia shall be employed There are a number of drugs used to produce spinal anesthesia These drugs differ somewhat as regards margin of safety and duration of action It is well known that other agents produce longer spinal anesthesias than procaine, but it has been established that of all the agents used, procaine is one of the safest Southworth and Hingson state that a duration of time up to one hour may be obtained using procaine as the anesthetic agent [2] A great many operations exceed this time Often because of this, the operator must hurry or must use an agent other than procaine He may be forced to supplement some other type of anesthetic to complete the surgical procedure An increased anesthesia time using procaine as an anesthetic would definitely be desirable.

Suprarenin was the first substance used intrathecally to prolong the duration of anesthesia This was done many years ago by Doenitz when he compared the action of cocaine solutions with that of cocaine and suprarenin injected into the spinal canal of cats [1] He felt that the anesthesia time was lengthened and that the toxic reactions of cocaine solutions were not only delayed but diminished

In 1927 Pitkin introduced spinocaine in a successful attempt to increase the length of time of spinal anesthesia through the use of novocaine. This increased length of anesthesia was accomplished by the addition of starch in the form of gliadin, which had the effect of slowing the diffusion of the solution in the spinal fluid and delaying its release to the nerve tissues The duration of anesthesia was prolonged over that of plain solutions of procaine The recommended dose was, however, considerably greater than the ordinary plain solution and this may in part account for the increased length of anesthetic time

In 1940 Lemmon reported a method of continuous spinal anesthesia by the injection of additional doses of procaine as needed through a needle left in the canal [3] By this method anesthesia was prolonged indefinitely It requires a special technic and apparatus however Associated with this method are always the possibilities of complications such as the displacement of the needle, the introduction of trauma or infection

In 1947, Romberger and Ratcliff mention using adrenalin and, subsequently ephedrine in a series of cases.[4] They report a measurably prolonged

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anesthesia time by the addition of these drugs Anesthesia, however, came on slowly

In 1935, I became interested in the possibility of prolonging the effects of procaine intrathecally Adrenalin was used in a few cases, but I was concerned about producing too great an ischemia in the cord and thus doing some permanent damage There was also a question of the possibility of an excessive rise in blood pressure

About this time I was interested in pitressin Pitressin is an aqueous solution of the pressor-diuretic-oliguric fraction of the posterior pituitary It is standardized to correspond to twice the pressor activity of the U S P Pituitary Solution (20 Parke Davis and Company units per cc) The pitressin used was from the regular ampules manufactured by Parke Davis and Company

Upon raising a wheal with a solution of procaine and pitressin, certain facts are soon evident, namely, that the local ischemia produced by pitressin is not nearly as marked as that produced by adrenalin under similar circumstances Also, the length of anesthetic time of a procaine-pitressin solution is much longer than that of a procaine solution alone This prompted further investigation

I searched for some consistent way to demonstrate the holding power of pitressin I determined the minimal lethal dose of strychnine per Gm for rats, which, upon injection, would produce a convulsion within a few minutes The same volume of solution was always injected in the same location intramuscularly If pitressin actually had the power to decrease the rate of absorption of a fluid, its addition to the strychnine solution should delay the onset of convulsions

The calculated dose of strychnine was always dissolved in the same amount of water When pitressin was used, 1 cc of pitressin, or 20 units, was added to 100 cc of water This stock solution was used as the solvent for the strychnine in the same volume as the plain water and strychnine solution Injections were made intramuscularly in the same area When adrenalin was used, the same procedure was followed There was an adrenalin concentration of 1 50,000 in the injected solution In all, several hundred injections were made, those listed in Fig 1 are regarded as typical

From these experiments it was evident that the addition of both adrenalin and pitressin delayed the onset of convulsions caused by the injection of a minimal lethal dose of strychnine in rats Part A of Fig 1 shows the time variations after injection of the plain strychnine solution before the onset of the first convulsion These variations may be due either to differences of sensitivity in various rats to strychnine, inability to make the injection intramuscularly, or a combination of both The average time for the onset of the first convulsion was approximately seven and one-half minutes

Part B of Fig 1 shows the ability of a 1 50,000 solution of adrenalin to delay the onset of convulsions The average time was approximately twenty-nine and one-half minutes Part C of Fig 1 shows the effect of the addition of pitressin in delaying the onset of convulsions The effect was greater than that of adrenalin by an average of ten minutes This method of studying holding time is more accurate than using adrenalin or pitressin in solutions of procaine and trying to determine the presence or absence of anesthesia The onset of a convulsion can be accurately timed, whereas the determination of the presence or absence of anesthesia may involve certain personal equations

Having, to my mind, satisfactorily established that pitressin had the power to delay absorption of a drug, I now became interested in the possibility of untoward side reactions According to Sollman, an injection of pitressin causes a rise in blood pressure [5] This rise is not as great as the rise following the injection of epinephrine The rise in blood pressure, however, lasts longer due to vasoconstriction This vasoconstrictor action is peripheral, because it will occur in perfused organs The muscle fibers of the capillaries are more sensitive than the arterial muscle, where

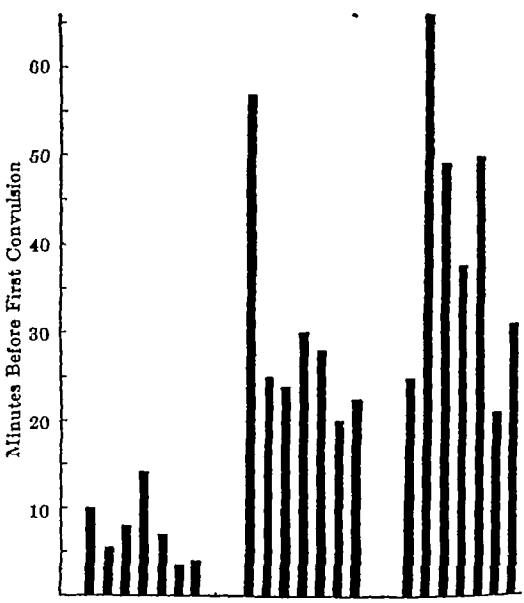


FIG 1 Effect of pitressin and adrenalin on delaying the onset of convulsions due to the injection of strychnine in rats

most of the action of ephinephrine takes place Thus vasoconstriction by pitressin extends to the coronary arteries The contractions of an excised heart are strengthened by pitressin, but the intact heart is weakened, due, undoubtedly, to coronary constriction.

A number of investigators have studied the effects of an injection of pitressin on the human circulation Graybiel and Glendy studied the circulatory effects of the intravenous administration of pitressin in normal persons, hypertensive patients, and those suffering from angina pectoris [4] The dose they employed was far greater than the dose I employ in my use of pitressin in spinal anesthesias I shall take the liberty of quoting them directly in some of their conclusions

Significant cardiovascular symptoms were observed neither in the normal persons nor in the patients with heart disease. There was evidence of marked constriction of the minute vessels and of the large arteries but not of the arterioles There were only slight changes in the pulse rate, blood pressure metabolic rate, and cardiac output.

Anginal pain was not reproduced in two patients with severe coronary heart disease who received sufficient pitressin to cause uncomfortable abdominal cramps. A minute amount of adrenalin when given to one of these patients produced anginal pain It is suggested that in certain respects pitressin and adrenalin act in an opposite manner the former causes coronary vasoconstriction but a decrease in the work of the heart, while the latter causes coronary vasodilation but an increase in the work of the heart.

Pitressin in therapeutic amounts may be given without fear of untoward cardiovascular effects.[4]

Since 1038 I have used pitressin routinely in 2,500 spinal anesthesias with procaine as the anesthetic agent Most of these cases were done at the Deaconess Hospital, Buffalo The only cases of spinal anesthesia in which pitressin is omitted are those in which the shortest possible spinal anesthesia is desired This would indeed represent a very small number

The technic employed is very simple. Ampules containing 200 mg of procaine (Abbott or Squibb) or novocaine (Winthrop) are used The 200 mg are dissolved in 5 cc of distilled water, to which are added five drops of pitressin from a 23-gauge needle Each cc. of solution represents 40 mg of procaine and approximately 1/4 unit of pitressin. Thus, an average dose of 3 cc of solution would represent 120 mg of procaine and 3/4 unit of pitressin In actual practice two to three minutes prior to making the spinal tap either 50 mg of ephedrine or 20 mg of methedrine are injected intramuscularly in the region of the buttocks. This helps to counteract any blood pressure drop Injection of the anesthetic solution is made in the usual way A dose of 120 mg of procaine and pitressin will usually give up to one and a half hours of operative anesthesia for abdominal work.

The dose of procaine varied from a low dose of 90 mg to a high dose of 130 mg For operations not involving the abdomen, 80 to 90 mg of procaine and pitressin will give two hours of operative anesthesia For abdominal work to umbilicus 120 mg., with 130 mg for work above the umbilicus will give better than one and one-half hours of operative anesthesia. In each case an average preclinic injection of morphine and atropine was used It has been my custom to supplement spinal anesthesia with sodium pentothal when the patient displayed unusual nervousness The dose is usually so small that long before the operation is over the patient is fully conscious so that there can be no doubt that operative anesthesia is present One can also observe that anesthesia comes on quickly fully as quickly as with procaine alone. Clinically, these patients are usually very comfortable, and ordinarily, there have been no serious blood pressure disturbances and little nausea. There have been no deaths on the operating table and none caused directly by the spinal anesthetic.

When this method was first employed, no preanesthetic blood pressure stimulant was used During this period blood pressure drops were far more frequent Ephedrine was first used routinely, mainly because it dilates coronary vessels and might therefore, counteract any possible coronary constrictor effects of pitressin It was very satisfactory However, we now also use methedrine in about one-half of our cases, and this works equally as well

The longest spinal anesthetic with procaine and pitressin was for a nephrectomy The operative time was three hours This was a longer operative time than can usually be obtained I have not made any attempt to determine routinely how long these patients had satisfactory operative anesthesia beyond what was needed to complete the surgical procedure. From my experience with pitressin, however, I can safely say that one can obtain one and one-half hours of satisfactory operative anesthesia for upper abdominal work with an increase in duration of anesthesia for work in the lower abdomen

Conclusion

I have found pitressin to be a drug that has the ability to delay the absorption of procaine from the tissues It may be used safely with procaine or novocaine in spinal anesthesia. By using it in spinal anesthesias with procaine, one can obtain a considerably longer anesthetic effect than by using this drug alone

Discussion

John H Geckler, M D , *Buffalo* —It was during my last year of residency in 1941 that Dr Stover first suggested this pitressin technic of prolonging procaine spinal anesthesias I was not very hopeful because I had already tried all the vasoconstrictor drugs with which I was familiar at the time—epinephrine, ephedrine, paredrine, and neosynephrine None of them, in the concentration I used, had been particularly promising The literature, however, showed that pitressin had its greatest effect on the capillaries, and so was worthwhile trying The coronary constriction did not concern me too much because my routine at the time consisted of prespinal ephedrine administration Moreover, the actual amount of pitressin used was only about a minim (There are more than 80 drops per cc through a 25-gauge needle)

The first case was a nephrectomy and lasted an hour and twenty minutes The second was a cholecystectomy, and when it was finished in a scant hour and a half, the effect of the 120 mg I used was still holding very well. Since then, I have used the technic whenever I thought that more than three-quarters of an hour of anesthesia was required

There is very little difference in the way procaine acts with or without pitressin other than in the duration of anesthesia There is no delay in the onset of anesthesia, but I believe there is a prolonged fixation time One seems to be able to influence the height of anesthesia by tilting the table for at least fifteen minutes after injection My approach has not been too scientific, for I hesitate to annoy any patient with a series of pinpricks when the results will influence neither the conduct of that particular case nor of any other My attitude is more than a clinical impression, however I might call it a clinical conviction

With good, longer-acting anesthetics like pontocaine, nupercaine, and metacaine, perhaps a continual search for technics to prolong procaine anesthesia is not necessary However, I should think that the majority of spinal anesthetics are given by men who are not full-time anesthetists A good many, I am sure, either do not have the volume of cases necessary or perhaps have not bothered to master the use of the other drugs Procaine may be their standby, and a good one it is

For them, and for any one, a drug which will prolong anesthesia without appreciably influencing one's own particular technic is worth trying This "one's own particular technic" factor is important. When one has used a drug with uniformly good results he feels strangely not so confident in others under the same conditions I have a colleague who prefers pontocaine, and the circulating nurse is almost as surprised when he asks for procaine-pitressin as when I ask for pontocaine

I have wondered how pitressin would act with the other drugs, pontocaine, for instance However, we do not do enough two- to four-hour operations under spinal anesthesia to make it practical to test the drug, and the test of its adequacy is in the operating and not in the persistence of anesthesia to pinprick.

In short, I like the technic, and I hope the procaine users will try it

References

1 Braun H Local Anesthesia Translated and edited by P Shields, 3rd ed Philadelphia Lea & Febiger 1914.
2 Pitkin G P Conduction Anesthesia, Edited by J L and R A Hingson *Philadelphia J P Lippincott Co , 1946*
3 Lemmon, W T and Paschal G W Pennsylvania M J 44 975 (May) 1941
4 Romberger F T , and Ratcliff F W J Indiana M A. 40 217 (Mar) 1947
5 Sollman T A Manual of Pharmacology 5th ed. Philadelphia W B Saunders Co , 1937
6 Graybiel A., and Glendy, R. D Am. Heart J 21 481 (Apr) 1941

PLANT-FRUIT EXTRACT AIDS HEART DISEASE PATIENTS

A "powerful drug" for treating heart disease was announced at the meeting of the Inter-American Cardiological Congress, in Chicago

"Distinct improvement" in 140 of 250 patients and "moderate improvement" in another 85 patients given daily doses of the drug were reported by Dr M R Kenawy of Cairo, Egypt Only 25 of the group showed no benefit

The drug is called khellin It is extracted from the fruit of a plant growing in the Middle East The fruit is called Amni visnaga

Khellin is a powerful dilator of the blood vessels of the heart Constriction of these blood vessels, with decreased blood supply to the heart muscle, is the trouble in some kinds of heart disease Khellin's dilating action is very prolonged, lasting for many hours It is apparently nonpoisonous

Because of its antispasmodic action, khellin also has been found suitable in treatment of bronchial asthma

For clearing the swelling, or dropsy, in advanced heart failure, lots of water, some acid and a moderate reduction in salt are needed, Dr F R Schemm, of Great Falls, Montana, declared

This treatment scheme succeeded in four fifths of 322 instances But in 160 other instances, the swelling was not cleared when only two of the three measures were used No two succeeded alone, even when salt was completely removed from the diet, or as much as eight quarts of water were given daily, or when heavy doses of acids were given with one or the other measure But much less drastic salt restrictions, acid doses, and water drinking when used together produced "dramatically" good results —*Science News Letter, June 19, 1948*

INTRAVENOUS PROCAINE IN THE MANAGEMENT OF THE INJURED HAND

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THE THREE cardinal principles in the treatment of the injured hand are the reconstruction of the anatomic structures, the prevention of sepsis, and the maintenance of function.[1] Adequate surgery and the judicious use of antibiotics and chemotherapeutic agents usually produce satisfactory results However, in some cases, even though reconstruction has been competent and infection prevented, complete or partial loss of function persists It is in this small group that the use of intravenous procaine has produced gratifying results

It is beyond the scope of this paper to review the many types of trauma to the hand or to evaluate the modifications of surgical procedures used It is our desire to describe a single method and the results obtained by it in the management of the injured hand

Pathologic Physiology

Disturbance of function is as a general rule an expression of a structural lesion but it is generally agreed that functional disturbances do not always accompany every discernible anatomic lesion Research by Claude Bernard and Maurice Raynaud in the physiology and pathology of the autonomic nervous system has demonstrated that the imbalance of the sympathetic and parasympathetic systems develops those polymorphic clinical symptoms which, in their early state, are independent of structural changes. As a result of repetition of stimulation, however an anatomic lesion may appear, manifesting not the cause of dysfunction but its consequence At first the structural changes are discrete and reversible being fused and irreversible later [2]

Trauma initiates an excitation of nerve impulses along vasomotor afferent neurons This may produce excessive vascular disturbances accompanied by edema, muscular spasm and pain In our previous reports on the pathologic physiology of inflammation and trauma, we suggested that the pain syndrome is produced by the dysfunction of the capillary unit the pathologic changes in the sympathetic ganglia, and the disturbance of the humoral balance [3-5]

It has been suggested that there is a shunt of efferent sympathetic impulses into the sensory somatic fibers at the site of injury to a nerve [6-8] The stimulation of the peripheral or primary neuron by direct injury or by an irritative process at the disturbed axon reflex arc will produce a causalgic state [9] It has been stated that lesions of peripheral nerves may produce the signs of causalgia without any of the symptoms [10] Identical vasomotor disturbances have been classified as Weir Mitchell's causalgia, Vulpeau's 6tat physiopathique Sudeck's atrophy Leriche's post traumatic osteoporosis, peripheral trophoneurosis, and chronic traumatic edema [11] Evans suggests that these entities be grouped as reflex sympathetic dystrophy [12]

Peripheral pain is intimately related to disturbances in the capillary bed The control of the distribution of blood in the capillary bed depends primarily on functional activity and the inherent neurogenic and humoral balance A traumatic or inflammatory stimulus will produce vasomotor disturbances of decreased capillary function, which in turn produces hypoxia With hypoxia and hydrogen ion concentration changes, capillary porosity takes place. It is at this stage that pain becomes noticeable [3] If an irritative process persists at this level a pathologic state of the sensory nerve fibers develops, which in turn produces a central disturbance at spinal and even cerebral levels

It is evident that the interruption of pain impulses, immediately following trauma, will help prevent a vicious circle of reflexes and in an established case of reflex sympathetic dystrophy will not only limit the pain impulses from spreading to a higher level but will also depress the irritable focus

When procaine is administered intravenously, it reaches the dysfunctioning capillary bed and anesthetizes the irritated nerve endings. The resulting relief of pain is usually accompanied by increased mobility and improved circulation.

Method

Since our preliminary report on the use of intravenous procaine, the only change that we have made in the preparation of the solution has been the addition of vitamin C either as sodium ascor

* By invitation.

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bate or ascorbic acid [3 5 13 14] One gram of vitamin C is added to 1,000 cc of isotonic saline solution containing 1 Gm of procaine hydrochloride **

The dosage prescribed is based on the "procaine unit" 4 mg procaine hydrochloride per Kg of body weight to be given in twenty minutes [3 15] To obviate the necessity of counting drops, the "flowrator," an instrument which accurately measures the rate of flow of intravenous fluids, is used [15] In a small percentage of cases, because of the patient's apprehension, it is advisable to give, as the initial infusion, one-half of the dosage prescribed by decreasing the length of time to a period of ten minutes None of our cases are premedicated with barbiturates

Addition of vitamin B complex to the procaine hydrochloride-vitamin C solution has not proved satisfactory Clinical evidence seems to indicate adsorption of the procaine radical to the vitamin B complex, thus inhibiting the action of procaine [16]

In over 3,000 infusions of procaine hydrochloride, we have encountered no untoward reactions It should be noted that when intravenous procaine is used in a 0 1 per cent concentration, it is an analgetic and not an anesthetic Variations which have been observed in the general analgetic effect of procaine administered to the same individual in the same dosage but on different occasions seem to be dependent on the status of the humoral balance Although the relief of pain is the sole guide to the effectiveness of this treatment, we have noted physical signs and radiologic changes indicative of recovery ,

Clinical Data and Case Reports

This report is based on 28 cases in which trauma involved the fingers, the hand, or those contiguous structures which produced hand symptoms Two cases of phantom limb are included in this series Eighty-five infusions were given to these patients Table 1 lists the number and types of cases, the number of infusions administered, and the results obtained

Reflex Sympathetic Dystrophy —The causative factors in the 21 cases of reflex sympathetic dystrophy are as follows Colle's fracture, 5, metacarpal fracture, 3, carpal fracture, 2, tenosynovitis, aseptic, 4, contusion of palm, 1, laceration of median nerve, 1, traumatic arthritis, 1, laceration of finger, 2, puncture wound of finger, 1, and abscess of finger, 1 Mitchell, Moorehouse, and Keen were the first to present a clear and complete description of this clinical entity [17] The pain syndrome can be produced by even a minor injury, and its intensity may vary from the most trivial burning to a state of torture The reaction on the body economy is such that the general health is often seriously affected

The following cases which are illustrative of the classic description of this condition typify the results that we have obtained by the use of intravenous procaine

Case 1 —J S is a 59-year-old elevator operator who, on November 25, 1946, caught his left hand in an elevator gate He had some pain in the hand but continued to do some work A week later he developed a felon of the distal phalanx of the left index finger which was treated by surgery and antibiotics The wound healed within two weeks. However, he complained of a severe burning pain arising from the scar and radiating up the hand and forearm. Touch and weather changes aggravated the pain. Physical therapy during the following four-month period produced no amelioration of signs or symptoms

When first referred for intravenous procaine therapy, the patient was extremely apprehensive and nervous and walked about with his right hand shielding the left Only a superficial examination was done because of the reluctance of the patient to withstand additional pain The skin over the left index finger was shiny and cyanotic Motion in the finger and the rest of the hand was limited Figure 1 shows the appearance of the injured hand and the maximum extent of flexion at the time of examination, September 9, 1947 Figure 2 is a radiograph revealing the extent of osteoporosis present

The patient received a total of four procaine infusions given at three-day intervals Physical therapy was instituted after the second infusion to hasten muscular recovery He was discharged and able to return to work three weeks after institution of treatment. Figure 3 shows the improvement in mobility at the time of discharge, when there was no pain, diminished cyanosis, and no vasomotor disturbances

TABLE 1

Type of Case	Number of Cases	Number of Infusions	Relief of Pain Good	Fair	Poor	Increased Function Positive	Negative
Reflex sympathetic dystrophy	21	62	17	3	1*	20	1*
Phantom limb	2	16	1	1			
Fracture	2	2	2			2	
Contusion abrasion, and laceration	2	2	2			2	
Trigger finger	1	3			1		1
Total	28	85	22	4	2	24	2

* This patient received only one infusion of procaine and did not return for further treatment.

**The procaine hydrochloride used was the product "Novocain" donated by the Division of Medical Research Winthrop-Stearns, Inc., New York City



FIG. 1. Case 1, J S Maximum amount of flexion of fingers prior to treatment.



FIG 3 Case 1, J S. Improvement in mobility at time of discharge September 30 1947

Prior to treatment, this man's disability was valued on the basis of a hand The final award was reduced to a partial permanent disability of a finger

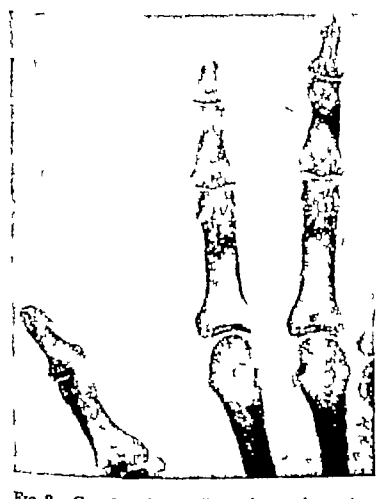


FIG 2. Case 1 J S Radiograph revealing osteoporosis of left index finger

Case 2.—C B a 32-year-old seamstress sustained a puncture wound on the ulnar side of the distal phalanx of the left index finger on August 28, 1947 Following surgical exploration, two fragments of a broken needle were removed. The wound healed by primary intention. Soon afterwards, pain developed in the finger and spread up the hand. At the time of referral on December 11, 1947 the patient exhibited limitation of motion severe pain, cyanosis of the fingers, and marked hyperhidrosis of the hand. Radiographic study showed osteoporosis of the affected digit.

This patient received a total of seven intravenous procaine infusions over a four-week period She made a good recovery signified by the absence of pain, increased mobility and ability to return to work. As in the preceding case, the original disability was computed on the basis of a hand, whereas final settlement was made on the basis of a finger

Case 3.—L. J is a 50-year-old housewife who about four weeks prior to her admission on June 6 1946 pounded the palm of her right hand repeatedly against a spade she was using in her garden. The hand and wrist became swollen, painful and disabled. On admission the patient complained of pain, swelling, redness, excessive sweating of the hand, and inability to use her right hand. A diagnosis of contusion sprain of the wrist and hand was made, and the hand was immobilized. Radiographic examination at that time revealed no abnormality (Fig 4)

The patient returned three weeks later June 27 1946 complaining of the same signs and symptoms Radiographic examination revealed osteoporosis,

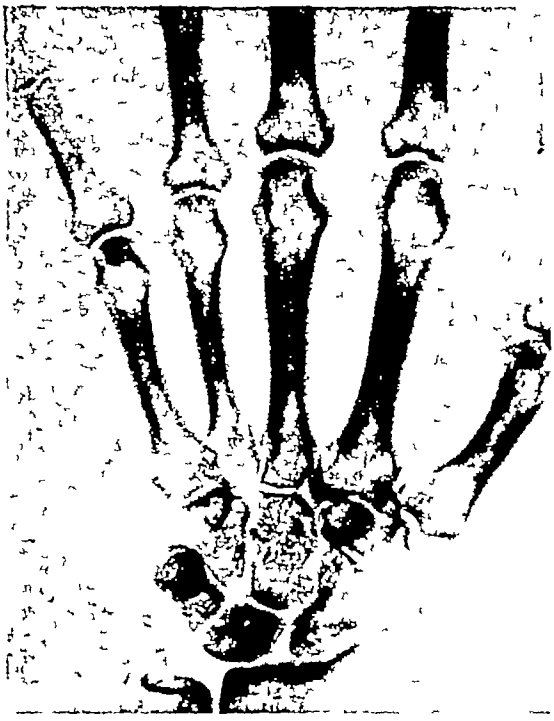


FIG 4 Case 3, L J Radiograph of the right hand, revealing no evidence of abnormality

(Fig 5) Intravenous procaine therapy afforded immediate relief of pain The patient received a total of four infusions in the following three-week period

When discharged on September 9, 1946, the patient had made an uneventful recovery A radiograph at the time of discharge revealed moderate recalcification (Fig 6)

Phantom Limb —It is difficult for us to understand the complaint of an amputee who states that he has sensation in his absent extremity However, 95 per cent of these patients make this complaint [18] If this sensation is painless, it disappears in time But a small percentage of amputees suffer from a severe burning, boring pain with the feeling of compression, or constriction or malposition of the amputated parts [19] The following case is characteristic

Case 4.—A L, a 58-year-old woman factory worker, sustained a crushing injury of the left hand and wrist in 1942 Following amputation at the upper third of the forearm, the patient complained of severe burning pains in the palm with extreme dorsiflexion of the wrist of the absent extremity The pain, which came on in spasms, was so severe that it was necessary to resort to opiates In April, 1947, a revision of the stump was done, and several neuromata were removed Although surgery relieved some of the lancinating pain, the sensation of clenched fingers remained Six infusions of intravenous procaine were given beginning on October 23, 1947 Although some mild parasthesia persisted at the time of discharge, the patient was sufficiently relieved to enable her to obtain a clerical position



FIG 5 Case 3, L J Radiograph revealing osteoporosis (Sudeck's atrophy)

Fractures —Bunnell considers post-traumatic stiffness of the hand to be the major problem in the treatment of fractures and dislocations of the hand [20] This post-traumatic loss of mobility may depend on the age of the individual, impairment of the nerve supply and the resulting trophic changes in the skin, or circulatory disturbances which produce edema, osteoporosis, and atrophy [21] The use of intravenous procaine in this type of case is very satisfactory, for the relief of pain encourages the mobility of the digits

Case 5 —P G, a 28-year-old bartender, was injured on March 28, 1947, when a barrel crushed his right hand Radiographic examination revealed a fracture of the fifth metacarpal bone at its proximal portion There was severe pain, swelling over the dorsum of the hand, and loss of mobility Following reduction and immobilization, the pain persisted, and increasing edema necessitated the reapplication

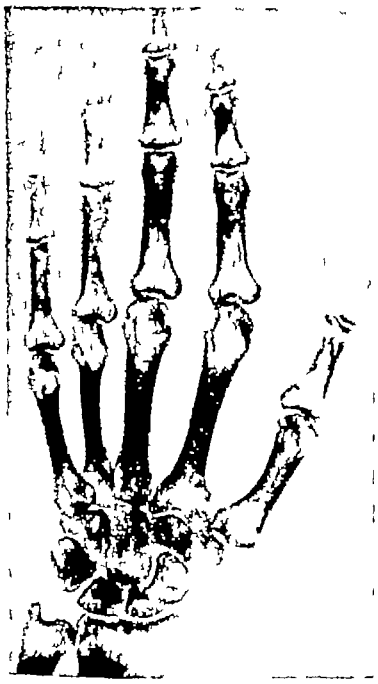


FIG 6 Case 3 L J Radiograph revealing redisposition of calcium.

of a bandage On March 31 1947 three days post trauma, an infusion of procaine was given There was immediate relief of pain Within two days the edema subsided Mobility of the fingers was encouraged and on the tenth post-traumatic day the patient returned to work pain-free Three weeks after the accident he was discharged with no residual defect.

Contusion, Abrasion, and Laceration —The use of intravenous procaine in these cases afforded us the opportunity to perform a rather painless debridement Its use allows for pain free procedures in the repair and dressing of superficial tissues

"Trigger" Finger —We have included this one case in our report to demonstrate the inability of intravenous procaine to overcome the pain initiated and maintained by a *mechanical factor* Three infusions, given during a period of two weeks, produced no change in the patient s condition.

Comment

Most physiologists agree that for the repair of injured tissues the following requirements are necessary adequate amounts of ascorbic acid equilibrium of serum proteins, and normal carbohydrate metabolism However, when a pathologic process develops, signified by vasospasm, capillary dysfunction, and pain, the function of these three factors in the normal process of repair is inhibited Any method, therefore, which *suppresses the development of the symptom-complex* of pain and allows normal healing to take place, is the method of choice

It has been shown that the restoration of the normal circulatory integrity to the extremity depends upon the release of the sympathetic vasoconstricting mechanism [22] This release can be accomplished by the use of intravenous procaine, which, by its analgetic and anticholinergic actions both relieves the pain and releases the vasospasm [22]

In cases of reflex sympathetic dystrophy, restoration of function has been hastened by the use of intravenous procaine Clinical observations lead us to believe that, if this condition is diagnosed in its early stages or is even anticipated, the prompt institution of procaine therapy may well prevent and will certainly reduce, the marked disabilities characteristic of this clinical entity The preventive action of intravenous procaine may be illustrated by the prompt relief of pain, early restoration of function, and early rehabilitation achieved by its use in the two fracture cases presented in this report.

In passing we may note that 30 per cent of all industrial accidents involve injuries to the fingers and hands. Nineteen per cent of all compensation paid is awarded to this group [24] The results obtained by the use of intravenous procaine in the management of selected cases seem to indicate that early rehabilitation and restoration of function can be attained by this method, thus reducing the over-all cost of medical care

Summary and Conclusion

Relief of pain early restoration of function, and early rehabilitation may be achieved by the use of intravenous procaine in the treatment of the injured hand

Discussion

Henry H. Ritter, M.D *New York City* —I feel that I have not seen a sufficient number of cases to make any positive statement as to the value of intravenous procaine *in the treatment of hand injuries.* I can say that we have seen some remarkable results and we have seen some cases in which it has been of no value

Causalgia is a reflex sympathetic dystrophy characterized by sharp burning pain, redness or pallor, swelling, sweating, and often atrophy and demineralization of bone Atrophic changes in the skin and muscles do follow

Often trigger points are present and injection of these trigger points with procaine in mild causalgias does give relief for a very short period of time, but in severe causalgias I have seen no good results from the injections alone Sympathetic blocks or sympathectomies are important adjuvants to trigger-point injection If the sympathetic block gives the patient relief from pain for a while and repeated injections are followed by the same results, then sympathectomy is certainly indicated

We have seen more causalgias in the upper extremity resulting from mild injuries such as bruises or sprains than from fractures The pain in causalgia is aggravated by moving the part, touching of the part, noise, and emotional excitement The pain of causalgia may subside spontaneously

About twenty-five years ago we began doing periarterial sympathectomies for causalgia, and, while at first we were enthusiastic about the results, we soon began to see recurrences For the most part, I believe periarterial sympathectomies are now seldom done, at least in this country

The signs of the value of treatment are relief of pain, either complete or in part, relief of sweating, increased warmth, and sense of well-being

We have seen three cases of definite Sudek's syndrome which was relieved by the intravenous administration of procaine and with radiographic reappearance of normal bone We have been able to dress some severely burned hands and treat such injuries, without general anesthesia, following the intravenous administration of procaine In our first case treated in this way, we were astonished by the complete absence of pain. In subsequent cases we have not had complete absence of pain

I should like to cite one case of an adult, white man, 38 years old, who was injured January 31, 1947, when his left hand was caught in a large gear He sustained a comminuted, transverse fracture of the lower end of the radius, fracture of the styloid process of the ulna, separation of the inferior radio-ulnar joint, fracture of the greater multangular, dislocation at the carpometacarpal articulation of the second and third fingers, and fractures at the bases of the proximal phalanges of the second and third fingers

He was immediately taken to a hospital, in a town not far from New York, where attempts at closed reduction failed On February 3, 1947, he was referred to me An attempt at closed reduction again met with failure We could not reduce the fractures and the dislocations If one was reduced, the other recurred The hand was extremely swollen, and patient was in considerable pain

On February 6, 1947, an open operation was performed, and a good correction of all displacements was obtained On the day following the operation the patient's hand was markedly swollen and cyanotic, the patient complained of a great deal of pain Daily injections of intravenous procaine were begun Immediately after the first injection the color of the fingers was improved, as was motion of the hand Treatment was continued for one week Soon the patient was moving his fingers The color of the hand was improved, and he made a rapid and splendid recovery He was discharged from the hospital on February 27, 1947

This experience was particularly stimulating, as this man's avocation was the piano He is a pianist of no mean ability, and two months after his injury he was again playing the piano, actively moving the part

I have not been able to reduce any fractures with intravenous procaine I do not believe sufficient relaxation can be obtained Further intensive study of the value of intravenous injection of procaine, particularly in hand injuries, is definitely indicated Its value has not been definitely established

References

1 McCallow F H M J Australia 2 349 (1947)
2 Delay J Presse med 72 833 (Dec 13) 1947
3 Graubard, D J Robertazzi R. W and P M C New York State J Med 47 2187 (1947)
4 Graubard D J, and Ritter H. H Am. J S 765 (1947)
5 Graubard D J, Robertazzi R. W Peterson and Waldman M H Anesthesiology To be publish
6 Mayfield F H Am J Surg 74 522 (1947)
7 Grant, R. Leskell L and Skogland C R. B 125 (1944)
8 Doupe, J Cullen, C H, and Chance, G Neurol, Neurosurg, & Psych 7 33 (1944)
9 Livingston, W K. West. J Surg 46 341 (193
10 Nathan P W Brain 10 245 (1947)
11 DeTakats G J A M A 128 699 (1945)
12 Evans J A Surg Gynec. & Obst. 82 36 (194
13 Graubard D J Robertazzi, R. W and P M C Anesth & Analg To be published
14 Graubard, D J and Peterson, M C Anesthesiology To be published.
15 Graubard D J Robertazzi R. W, and Peter C Anesthesiology 8 372 (1947)
16 Unpublished data
17 Mitchell S Weir Moorehouse G R. and K W Gunshot and Other Injuries of Nerves, Philadel B Lippincott Co, 1864
18 Randall G C, Ewalt, J R. and Blair, H. J 128 645 (1945)
19 Herrmann L G and Gibbs, E W Am. J S 188 (1945)
20 Bunnell S Surgery of the Hand Philadel B Lippincott Co 1944
21 Woodland L. J M. J Australia 2 351 (1947)
22 Thomson, J E M Helwig F, and Sire, Bone & Joint Surg 26 189 (1944)
23 Frommel E., Favre M and Vallette F A ternat. de pharmacodyn. et de therapie 73 365 (Feb) 1
24. National Safety Council Accident Facts 1947 Chicago Illinois

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STUDY DAYS NEVER END

The busy general practioner should never forget that his days of study and learning are never over The medical schools are again all giving excellent postgraduate courses Don't let any man think he can be a success in his office or hospital if he does not take a few weeks occasionally to bring himself up to date on the work he enjoys —*California Medicine, April, 1948*

INTRAVENOUS ANESTHESIA

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(*From the University of Buffalo, School of Medicine*)

THE ADMINISTRATION of anesthetic drugs intravenously has advanced so far beyond the experimental stage that one might call this "The Era of Intravenous Anesthesia" Certainly with the introduction of pentothal sodium in 1934 by Lundy and Tovell, the intravenous route of administration has steadily gained in popularity and taken its proper place with inhalation and spinal technics [1] Intravenous anesthesia may also be combined satisfactorily with inhalation, spinal, and local agents to produce a more highly desirable type of anesthesia from the surgeons', patients , and anesthesiologists' viewpoint

Disregarding some of the earlier drugs administered intravenously, such as avertin, sodium amytal, ether, and alcohol some of which have a limited use in present-day anesthesia, the essential agents which are to be discussed are pentothal sodium, curare (intocostrin), and d tubocurarine chloride, procaine, and nembutal

Pentothal Sodium

Pentothal sodium is the most widely used intravenous anesthetic at present It can be administered alone for minor procedures of short duration requiring no muscular relaxation Frequently, pentothal sodium is given in the room of the thyrotoxic patient not only to prevent the anxiety of the patient's journey to the operating room but also to avoid knowledge of the impending surgery [2] The ease and speed of induction makes this drug particularly desirable in certain groups of patients, for example, alcoholics, highly nervous individuals, those who fear a mask, and patients who have had previous unpleasant anesthetic experiences It must be remembered that deep or prolonged anesthesia can be obtained only by administering an overdose Therefore, it is wiser to combine pentothal sodium with other anesthetic agents for those cases which require marked relaxation.

Certain dangers, inherent in the use of pentothal sodium, are worthy of consideration Errors, both in the selection of patients as well as in the administration of the pentothal sodium, may lead to the occurrence of a severe anoxia Patients with marked anemia, especially that caused by loss of whole blood, tolerate pentothal sodium poorly because the barbiturates in themselves tend to cause a dilution of the blood as previously reported by one of us (P S) [3] This dilution may further decrease the oxygen-carrying capacity of the blood Likewise respiratory obstruction from any cause can be responsible for the development of anoxia during the administration of this anesthetic agent This respiratory obstruction may be complete or partial and may be caused by improper support of the jaw, laryngospasm, tracheal obstruction, bronchospasm, emphysema, or pulmonary edema. Furthermore sodium pentothal is contraindicated in operations on the head and neck where respiratory obstruction may be caused by an accumulation of mucous secretions in the throat, where a reflex stimulation of the carotid sinus may cause a laryngospasm, or where the airway is actually obstructed in such conditions as Ludwig's angina Even during the actual administration of this intravenous barbiturate, when no respiratory obstruction is present anoxia may be produced by a depression of respiration This oxygen lack may cause a stimulation of respiration, and a false impression may be gained, if respiratory depression alone is taken as a warning sign In addition, anoxia, so produced, may cause an increase in the carbon dioxide of the blood with a subsequent elevation of the blood pressure.

Curare

Curare was first used in anesthesia by Griffith and later by Cullen in combination with cyclopropane [4 5]

The forms of curare which are available on the market are intocostrin and d-tubocurarine chloride D-tubocurarine in contrast to intocostrin is soluble in pentothal sodium and is measured in milligrams For example 3 mg are contained in each cc of d-tubocurarine whereas there are 20 units per cc of intocostrin Curare is not an anesthetic per se since it does not produce analgesia but is primarily a relaxing agent for skeletal muscle its site of action probably being the myoneural junction. [6–8] This action of curare is thought to be accomplished by raising the threshold to any stimuli brought to it

The only actual contraindication to the use of curare is myasthenia gravis but it is not wise to give curare to patients whose respirations are already depressed or impaired by other causes. The most serious hazard in the administration of this agent is the occurrence of anoxia, which may

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be the result of a marked respiratory depression or an overdosage of the drug However, in most instances this respiratory depression with its resultant anoxia may be overcome by instituting "reinforced or controlled respirations" In rare instances, a bronchospasm may occur This is especially true when curare is used with pentothal sodium or cyclopropane which in themselves are prone to produce bronchospasm, especially in allergic or asthmatic individuals Bronchospasm is evidenced by an inability to ventilate the lung adequately, even in spite of "reinforced or controlled respirations" Neo- or prostigmine are theoretically the agents of choice to counteract this spasm, but, in practice, administration of either neo- or prostigmine may only accentuate the condition The treatment of bronchospasm is essentially the providing of a clear airway, institution of artificial respiration, the inhalation of oxygen, and the administration of atropine sulfate intravenously in 0 01 grain dose

It is doubtful whether neo- or prostigmine have any place in the treatment of an overdose from curare This statement is made reservedly, because a simple respiratory depression, uncomplicated by bronchospasm, can be treated with prostigmine However, atropine sulfate should be administered intravenously with the prostigmine to prevent a flood of mucus which might occur from its use It would seem best then to counteract any type of curare-like overdosage with the method outlined in the previous paragraph, i e, artificial respiration, oxygen, and atropine, and thus avoid any possibility of encountering undesirable effects from the prostigmine

The dose of curare is extremely variable However, the most important fact to bear in mind is that only a minimum dose should be administered This amount should be just sufficient to produce relaxation and not apnea Experience has shown that "reinforced or controlled respirations" are more apt to produce anoxia and to ventilate the lungs less adequately than the patient's own respirations

Another reason for avoiding an excess dosage of curare is the possibility of the liberation of histamine in the skin and muscles [9] Also, large amounts of curare may cause a peripheral vascular collapse because of the depressive action on the sympathetic ganglion It should be emphasized that curare is eliminated in twenty to thirty minutes, and, therefore, sufficient time should be allowed to lapse to use up even the smaller doses before subsequent injections are administered

Procaine

The use of novocaine intravenously for relieving pruritus in jaundice cases was first suggested by Lundy [10] While overseas in 1943, one of us (P S), through the efforts of Colonel R M. Tovell, undertook the investigation of the effects of the intravenous administration of procaine and administered 1 Gm of procaine in 1,000 cc of saline solution with no ill effect Subsequently, other workers found intravenous procaine to be useful in burns and other painful conditions The use of intravenous procaine as an anesthetic in itself, as reported by Allen, has not been tried extensively by many anesthesiologists at the present time [11] There is a danger that convulsions, caused either by a sensitivity or an overdosage, may occur This reaction limits its usefulness

Fraser has successfully used a combination of procaine and pentothal sodium [12] His proportions are 1 Gm of pentothal sodium and 1 Gm of procaine added to 1,000 cc of 5 per cent glucose and saline solution He has stated that this combination tends to decrease the irritability of the heart to cyclopropane, reduces the incidence of anuria, and provides postoperative analgesia

Burstein believes that intravenous procaine administered during anesthesia, especially in thoracic operations, diminishes the hyperirritability of the cardiac conducting system and reverts a shifted pacemaker to the sinus node [13]

Anesthetic Drugs in Combinations

Pentothal Sodium, Nitrous Oxide, and Oxygen — The combination of pentothal sodium, nitrous oxide, and oxygen, in cases where no relaxation is required, is one of the most popular methods employed today This method which was used extensively both in England and in this country is proof of its efficiency The vast majority of war wounds were amenable to this combination It is highly recommended as both safe and satisfactory when relaxation is not of prime importance The pentothal sodium serves to maintain a well-oxygenated patient, providing a 50 50 mixture of nitrous oxide and oxygen are administered with it

Pentothal Sodium, Nitrous Oxide, and Ether — One of the most interesting combinations, reported by one of us last year at the 141st Annual Meeting, is the combined use of pentothal sodium, nitrous oxide, and ether Used as the inducing agent, pentothal sodium is also administered during the operation to desensitize the respiratory center and thereby enable the anesthetist to introduce to the patient the desired amount of ether safely and rapidly and at the same time avoid high ether concentrations This method has enabled us to secure rapid relaxation during the operation which has proved most satisfactory to the surgeon There has been a minimum of postoperative anesthetic complications with this combination of pentothal sodium, nitrous oxide,

and ether, and the amount of ether required is less than that required with nitrous oxide, oxygen, and ether alone We have encountered fewer difficulties with this type of anesthesia than any other tried up to this time

Local Block and Pentothal Sodium —Pentothal sodium is extremely useful when performing a painful local block. The sleeping patient has no memory of the performance of the block and, in addition, the antagonistic action of the barbiturate tends to lessen any toxic reaction to the injection of the local anesthetic drug We have found pentothal sodium extremely useful in brain surgery where it has been combined with a regional block. The success of using pentothal for long operations, such as a craniotomy, lies in administering very small doses and in limiting the total dose to 1 to 2 Gm. *for a four to five hour operation* The patient is held in an analgesic state, the only indication for additional doses of pentothal during the operation consists of an actual movement on the part of the patient The air way is patent because the patient's jaw is not completely relaxed, *and, therefore, the patient* maintains his own airway This method is not amenable to the head-down position or if the patient's head is inaccessible to the anesthetist In this latter instance, in addition to the administration of the pentothal sodium, an intratracheal tube, *through which nitrous oxide and oxygen* mixture is administered, is absolutely essential In our experience, ether, even with the addition of an intratracheal tube, results in cerebral edema far more often than with the use of a combination of regional anesthesia and pentothal sodium.

Curare and Nitrous Oxide —The use of large doses of curare 150 to 200 mg , with nitrous oxide and oxygen was first reported by Harroun, Beckert and Hathaway [15] This method introduces a large dose of curare on induction and may lead to severe complications in unskilled hands The use of cyclopropane added in small doses to this combination, as reported by Holaday, provides a slightly deeper plane of anesthesia and tends to decrease the dose of curare [16]

Curare and Cyclopropane.—Curare was first used in combination with cyclopropane as previously mentioned [4 5] This method is employed successfully by many anesthesiologists The cyclopropane provides a light plane of anesthesia which leads to the safe conduct of the anesthetic. We have administered these drugs for many cholecystectomies, choledochostomies, and other major abdominal cases. It has been found that less curare is needed when cyclopropane and oxygen are administered than when nitrous oxide and oxygen are used

Ether and Curare —One-third less dose of curare is required when using ether This fact is mentioned only as a condemnation of the method.

Nembutal and Curare —The combination of nembutal given intravenously with curare to facilitate intubation, as recently reported by Carron, Stoelting and Cullen, revives the use of a longer-acting barbiturate than pentothal [17] Drugs such as nembutal and sodium amytal had been disregarded previously because of the long postoperative sleep following their use To avoid this danger, the dose of nembutal should always be small. *Their method of maintenance* consists of administering nitrous oxide and curare and occasionally pentothal sodium This technic has not had sufficient trial and is certainly open to criticism if a long postoperative depression follows the use of nembutal and curare.

Curare with Spinal Anesthesia —Curare can be used satisfactorily to supplement spinal anesthesia either when relaxation is not complete or when the duration of the operation has outlasted the anesthesia. The dose of curare necessarily should be small, and a word of warning should be interjected to the effect that a general anesthetic, such as pentothal, nitrous oxide, or cyclopropane, should be administered along with the curare so that the patient is not awake or suffering pain.

Pentothal Sodium, Curare, and Nitrous Oxide.— The combination of pentothal sodium, curare, and nitrous oxide is as nearly an ideal combination as any of the methods which employ curare. This method has been more refined by the development of d tubocurarine which has been perfected by Baird [18] Baird and his associates have administered this combination of anesthetics for practically all types of operations In their hands, d-tubocurarine, when mixed with pentothal sodium, produces a more uniform anesthesia than when the two drugs are used separately

Summary

We have tried to evaluate the various common drugs used in intravenous anesthesia and to point out some of the salient features embodied in their administration

With the administration of either pentothal or curare, it must be borne in mind that the occurrence of anoxia is an ever present hazard Avoiding the use of pentothal sodium or curare in conditions leading to respiratory obstruction will prevent to a large degree, the calamity of an asphyxiated patient

Pentothal sodium has proved to be a most valuable intravenous anesthetic agent for induction and, when combined with other agents, can be used advantageously in the maintenance of deeper planes of anesthesia.

Curare, a more recent addition, does relax

skeletal muscle but is still used cautiously by most anesthesiologists The place of curare then rests with a more thorough clinical trial and a sensible evaluation of its usefulness and danger

Procaine, intravenously, has a place in controlling arrythymias and auricular ventricular tachycardias during anesthesia There is some reason to believe that procaine can be used intravenously to improve general anesthesia However, more work is needed to justify this statement

The use of the intravenous route in anesthesia has greatly augmented the speed with which pain relief, unconsciousness, and relaxation can be obtained It must be remembered that no one intravenous agent possesses all the characteristics of the ideal anesthetic Therefore, many combinations of anesthetics have been, and are being, used to secure the most suitable type of "balanced anesthesia"

Discussion

Samuel L Lieberman, M D, *Buffalo*—The intravenous route of administration has enabled the anesthetist to bypass the respiratory tract Surgical anesthesia is dependent on the establishment of certain blood concentrations of the various agents Any inadequacy of the respiratory tract thereby produces a barrier between the inhalation anesthetic and the patient's blood stream Breath-holding, laryngospasm, or inadequate ventilation due to excess morphine are common problems which produce this respiratory barrier between the gas machine and the patient's blood stream Often when one uses cyclopropane, anesthetic concentrations in the blood stream can be achieved and maintained only by controlled respirations Thus, the more direct intravenous route for drug administration is preferable

The various combinations just analyzed by Dr Searles indicate that today any one agent is but a part of a total anesthetic When used in combinations, one agent cannot only make up for the deficiency of another agent but may also counteract some undesirable effect of this agent Although pentothal bypasses the respiratory tract in its route of administration, its most undesirable effects are manifested in the respiratory system Thus, while this drug is used in more and more patients for a pleasant and rapid induction, one strives to use less and less of it in any one case The anesthetist who wishes his patient to react promptly upon completion of surgery shies away from large doses of pentothal At times even a gram of pentothal will result in prolonged sleep, characteristic of barbiturate poisoning There exists the possibility of respiratory depression, hypoxia, and pulmonary complications A note of warning is in place for the house staff in this situation Morphine and pentothal potentiate the action of each other If morphine is administered to a patient who has received a large dose of pentothal when this patient is showing signs of restlessness in the postoperative ward, this dose of morphine may very well put such a patient back into a deep coma

The second major problem of pentothal anesthesia is that of the hyperactive throat and laryngeal reflexes One must be wary of using this drug in patients presenting evidence of throat and laryngeal irritations, most common being the chain smoker with a throaty voice It is desirable to cocainize these cases as a prophylactic measure, curare must be available to break a laryngospasm, and the endotracheal tube may be needed

The intravenous route is an accepted advance over the inhalation route Greater use of it is dependent on resolving the inadequacies of the agents which are available at present Perhaps future technics will introduce anesthetic agents even closer to their site of action, bypassing not only the lungs but the peripheral vascular system as well

References

1 Lundy J S and Tovell, R. M Proc. Staff Meet., Mayo Clin. 10 257 (Apr 24) 1935
2 Lenahan R. M NEW YORK STATE J MED 46 1924 (Sept.) 1946
3 Searles P W J A.M.A. 113 906 (Sept 2) 1939
4. Griffith H K., and Johnson C E. Anesthesiology 3 418 (July) 1942
5 Cullen S. C Surgery 14 261 (Aug.) 1943
6 Whitacre R. J and Fischer A. J Anesthesiology 6 124 (Mar.) 1935
7 Smith Scott M. Brown Hugh O Toman E. P., and Goodman Louis S *Ibid* 8 1 (Jan.) 1947
8 Bernard, Claude Compt rend Acad d. Sc 43 824 (Nov 3) 1856
9 Conroe J H., Jr and Dripps R. D Anesthesiology 7 260 (May) 1946
10 Lundy, J S Clinical Anesthesia Philadelphia W B Saunders Co 1942
11. Allen F M Am. J Surg 70 283 (Dec.) 1945
12 Fraser, R. G Personal communication.
13 Burstein, C *Ibid* 7 113 (Mar.) 1946
14. Searles P W NEW YORK STATE J MED 47 2091 (Oct 1) 1947
15 Harroun P., Beckert F E and Hathaway, H. R Anesthesiology 7 24 (Jan.) 1946
16 Holaday, D A. *Ibid* 7 426 (July) 1946
17 Carron H. Stoelting V K. and Cullen, S C *Ibid* 9 11 (Jan.) 1948
18. Baird J W Johnson, W R and Van Bergen F H *Ibid* 9 141 (Mar.) 1948.

STREPTOMYCIN SENSITIVITY

Rubber gloves should be worn when handling streptomycin or the syringes and needles used Dr Solomon M. Rauchwerger and associates of the Veterans Administration Hospital at Oteen, North Carolina, report that six nurses had erythema followed by pruritus and papulovesicular eruptions after administering the drug to patients In two cases skin was denuded over the tips of thumbs and index fingers, probably from the syringes and needles used for streptomycin injections Intradermal tests may be advisable for determining sensitivities of persons who work with the drug When 100 units of the drug were administered intradermally to each of 97 members of the nursing staff, seven had positive reactions—*Modern Medicine, June 15, 1948*

PULMONARY PATHOLOGY AS RELATED TO INFANT RESUSCITATION

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THE INITIATION and maintenance of respiration in the apneic newborn infant has been of profound interest not only to the obstetrician and pediatrician but also to the anesthesiologist because of his intimate concern with respiratory problems Numerous resuscitative methods have been advocated Most of these were originally based on clinical experience but have come to be evaluated more upon a physiologic and pathologic basis

According to the statistics of the birth registry, about 80,000 infants die annually at birth in this country, and 30,000 more die in the first day from causes which are mostly of natal origin [1] The principal causes of infant mortality during the first twenty four hours are prematurity cerebral hemorrhage and asphyxia The cause of asphyxia as reviewed by Russ and Strong is clearly classified as follows (1) various forms of toxemia of pregnancy, (2) prematurity, (3) prepartal analgesia, (4) postpartal anesthesia, (5) type of delivery, and (6) type of labor [2]

Many newborn infants have abnormalities and pathologic conditions which do not give clinical findings. Davis and Stevens in a radiographic study found that 55 per cent of newborn babies show some abnormality, 26 per cent of the group showing abnormalities of the lungs, including spontaneous pneumothorax increased hilar densities Increased peribronchial markings and ateleotasis [3]

The purpose of this paper is to investigate by means of the roentgenogram the status of the thoracic cage and its contents in the newborn, before pulmonary aeration and the changes that take place during resuscitative measures and after the establishment of voluntary respiration.

Method

All x rays of the newborn babies were taken in the delivery room, utilizing standardization of technic. The investigation in no way interfered with the form of anesthesia or obstetric delivery Attempt was made to take roentgenograms of the newborn infants under conditions that ordinarily prevailed in any series of cases on the obstetric service Prepartal analgesia consisted of demerol 50 to 100 mg and scopolamine $^1/_{100}$ to $^1/_{200}$ grain when the cervix was 4 to 6 cm dilated The time of premedication to delivery varied from one-half to eleven hours Prepartal anesthesia was open drop ether, and the majority of these cases were lightly anesthetized The average length of time of anesthesia was twenty-five minutes The equipment consisted of a heliosphere portable x-ray, 14 by 17 inch cassettes and an accessory table of the same height as the standard one used by the obstetrician The exposure time of $^1/_4$ second the voltage of 60 kilovolts, and the distance of 30 inches from x ray table to baby were constant throughout the entire series

A 14 by 17 inch cassette was placed at one corner of the obstetrician's table under the sterile drapes One half of the cassette was covered by a lead plate Immediately after birth the obstetrician, without taking time to ligate the umbilical cord, placed the baby in the anteroposterior position upon the sterile covered, exposed portion of the cassette Roentgenograms were taken in the following order immediately at the time of birth, after initiation of respiration, one hour after active respiratory effort, and the last one five days later In some instances, roentgenograms were taken during the various phases of artificial resuscitation. The initiation of respiration in any baby was not delayed to take the roentgenograms

Results

A total of 33 newborn babies were investigated Twenty three did not need any resuscitative measures Ten required resuscitation and of this number seven received gentle external stimulation two mouth-to-mouth inflation and one mouth to endotracheal tube inflation.

A total of 109 roentgenograms were obtained Twenty-one were taken of babies before they started to breathe, and they all had similiar and typical roentgenographic characteristics The x ray negatives show that the ribs form an acute angle with the spinal column and the intercostal spaces are narrow The x ray density throughout the thoracic area is uniform, and there is no delineation of the intrathoracic structures The thoracic cage is constricted superiorly and flares out inferiorly to a relatively enlarged abdomen These features give the appearance of a 'funnel shaped contour' of the thoracic cage (Fig 1)

Roentgenograms of twelve newborns were ob-

By invitation.

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FIG 1 Contour of the thoracic cage of the newborn before the onset of respiration

tained after the initial respiratory effort (Fig 2) These x-rays show varying degrees of expansion of the lung fields The lateral borders of the lungs are the first portions to be aerated The roentgenographic clarity of outline of the intrathoracic structures parallels the amount of air inspired and the degree of aeration

All the roentgenograms of the babies that were taken after active breathing show striking changes of the chest in contrast to those taken before the initiation of respiration (Fig 3) At this time it can be seen that the thoracic cage appears larger in all dimensions and loses its preventilatory "funnel shape" The structures of the chest and mediastinal contents are clearly defined Air is present in the gastrointestinal tract, and the amount is in direct proportion to the degree of respiratory effort and active crying of the newborn Subsequent roentgenograms taken one and five days after birth show no demonstrable changes in the lung fields as compared with those that were taken immediately after active respiration on the day of birth The only difference in this group is the increased amount of air throughout the gastrointestinal tract

The cases described below are offered to demonstrate the following (1) atelectasis of the newborn, resuscitation by mouth to endotracheal tube insufflation, and the recurrence of partial atelectasis although the baby gave the impression of complete expansion of the lungs, (2) bilateral



FIG 2 X-ray negative of newborn baby immediately after making one respiratory effort. Note slight aeration of the lung field and maintenance of the "funnel-shaped" thoracic cage

atelectasis of the premature baby with a pneumothorax on the right side, onset of clinical symptoms appearing four hours after delivery, and (3) clinical impression of marked respiratory obstruction in a newborn one hour after birth with negative roentgenograms of the chest and a patent tracheobronchial tree

Case Reports

Case 1—A full-term baby delivered via perineal route, who made no respiratory effort after birth, was resuscitated by the introduction of an endotracheal tube and endotracheal suction with gentle mouth-to-tube inflations Spontaneous respirations occurred within twenty minutes of resuscitation The patient then presented a clinical picture of normal respiratory effort The first x-rays, taken immediately after birth, indicated no pathology (Fig 4) The roentgenograms taken during mouth to endotracheal tube insufflation reveal bilateral massive atelectasis (Fig 5) After adequate endotracheal suction and continuous insufflation for twenty minutes, the baby made voluntary respiratory efforts The clinical impression at that time was that both lungs were fully expanded Another roentgenogram was taken, and it shows that the right upper

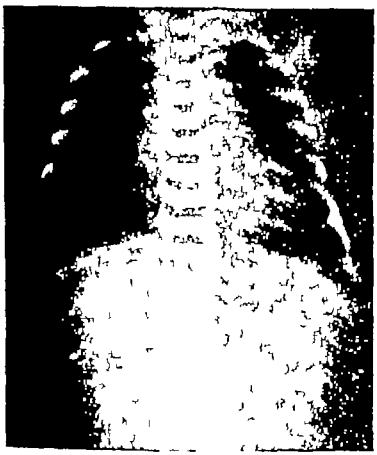


FIG 3. Typical roentgenogram of the marked change in chest cage following active breathing by the newborn baby Note increase in diameter of the apex and the complete aeration of the lungs. Photograph was taken six minutes after birth, and air was now evident in the stomach.

lobe remained collapsed. The infant was intubated and the lungs reinflated by insufflation for the second time (Fig. 6) Subsequent x rays demonstrate that



FIG 4. Initial x-ray of Case 1



FIG 5 Roentgenogram of Case 1 taken during resuscitation.

the atelectatic lobe did not fully re-expand until about seven hours after the second resuscitative attempt and only then four hours after the baby initiated vigorous crying

Case 2.—Four hours after delivery by cesarean section a premature infant of seven and a half months gestation which breathed and cried sponta



FIG 6 Return of atelectasis in right upper lobe, even after active endotracheal suction and inflation.



Fig 7 X-ray of a premature baby revealing a pneumothorax on the right side and bilateral massive atelectasis

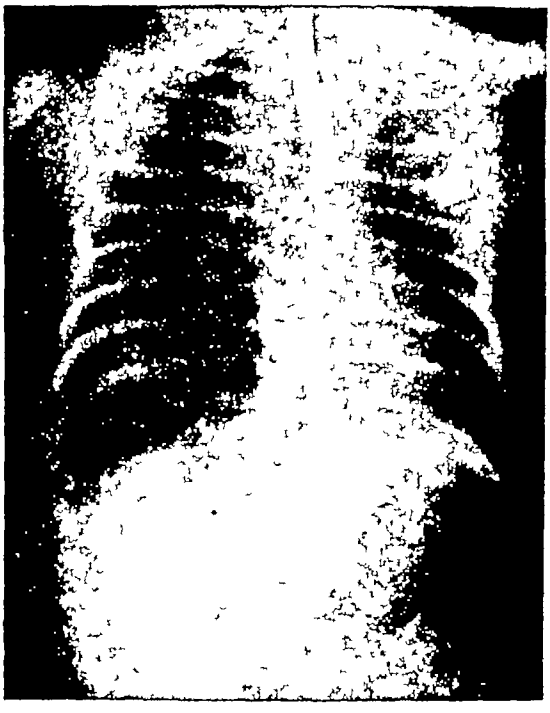


Fig 8 This photograph shows that inflation of the lungs was impossible in this case

neously after birth, presented the clinical picture of central depression There were intermittent periods of apnea followed by repressed tidal exchange Although this baby was not resuscitated, a roentgenogram revealed bilateral massive atelectasis with a pneumothorax on the right side (Fig 7) The baby expired twenty-four hours after birth, immediately after its death an endotracheal tube was introduced, and oxygen was administered by positive pressure for the purpose of seeing the degree of expansion of the chest wall and the questionable degree of expansion of the lungs Although the thoracic cage fully expanded during this measure, the roentgenogram showed that there was a slight amount of air only in the upper left lobe, and there was no change in the upper lobe and the pneumothorax At postmortem examination both lungs were found to be liver-like in appearance and showed the fetal type of atelectasis (Figs 8 and 9)

Case 3 —This full-term baby demonstrated clinical symptoms of marked respiratory obstruction one hour after birth Roentgenograms of the chest presented no evidence of tracheal compression or of pulmonary pathology The baby was placed in an oxygen tent, and during the subsequent ten days the clinical symptoms gradually disappeared

Comment

The contour of the thoracic cage of the newborn infant before it makes respiratory efforts is funnel-shaped in appearance as shown in Fig 1 The greatest degree of expansion occurs in the upper portion of the chest cage after the baby breathes (Fig 2) Pathologic thoracic entities cannot be revealed by a roentgenogram taken at this time of life before the initiation of respiration Air enters the stomach immediately after the onset of breathing, and the amount of air in the entire gastrointestinal tract is in direct proportion to the amount of crying and the degree of respiratory exchange made by the baby In those newborn infants, where the breathing is depressed

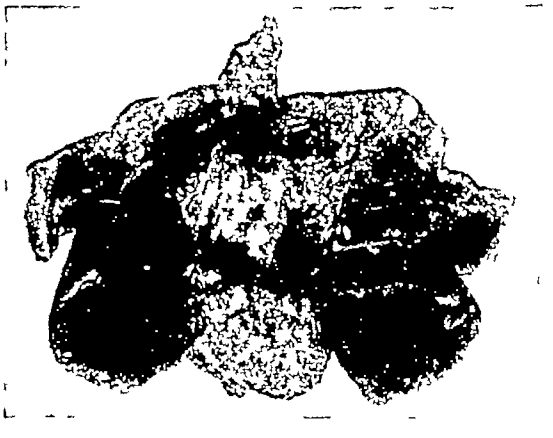


Fig 9 Gross pathologic specimen of Case 2 demonstrating an emphysematous bleb in the left upper lobe, mediastinal emphysema, and solid, neonatal lung tissue

very little air is visible in the gastrointestinal tract.

Evidence is produced to show that the degree of expansion of the chest wall during artificial resuscitation is no indication of the degree of expansion of the lung. This factor is of vital importance when considering the technic of resuscitation by endotracheal tube plus insufflation or positive pressure. In those cases that have a fetal type of atelectasis, gentle prolonged insufflation is a safer method than direct application of positive pressure. By insufflation the individual resuscitator can determine the degree at the time when the slightest amount of resistance is experienced irrespective of the extent of thoracic expansion. Numerous writers have designated definite degrees of positive pressure that are within safety limits, but this procedure should not apply to the cases of atelectasis in the premature baby, because the lungs have not fully developed and may rupture.[4-6]

The differentiation between asphyxia pallida and asphyxia livida should be made before attempting artificial respiratory efforts by any method. In those cases which present the picture of asphyxia pallida, the method of 'mouth-to-mouth insufflation may be quite ineffective because of the atonic pharyngeal and laryngeal musculature. In these instances, most of the insufflated air would enter the gastrointestinal tract rather than the pulmonary bed. It would be advisable therefore, to introduce an endotracheal tube and thus inflate the lungs directly.

Careful clinical diagnosis of respiratory abnormalities can be found to be inaccurate according to roentgenographic evidence. Active resuscitative measures in those cases that have no pulmonary pathology can often produce more damage than good. Spontaneous pneumothorax can be present during the newborn period this condition occurring even in those cases that did not have any form of resuscitative measures. However, if the respiratory effort of the newborn with a spontaneous pneumothorax need be augmented, it is important first to obviate the pneumothorax.

Atelectasis of the full term baby can be actively treated by endotracheal suction and insufflation. In many instances the atelectasis will be alleviated for a short period of time but can recur and will clear up after active crying.

Conclusions

1. Roentgenographic studies demonstrate the changes in the thoracic cage before and after the onset of respiratory effort of the newborn.
2. Spontaneous pneumothorax can occur during the newborn period.
3. The degree of expansion of the chest wall during artificial resuscitation of the fetus does not indicate the extent of pulmonary inflation.
4. This study reveals the value of roentgenograms of the newborn baby having respiratory difficulties.

Discussion

H. D. Eastman, M.D., *Albany*.—To me, the most striking feature of this paper is the rapid and roentgenographically complete aeration of the lungs with a hearty cry and its associated deep breathing. The report of Wasson, referred to in the paper appears to emphasize a time element with complete aeration in some cases within five minutes and in others, particularly in those babies with prolonged difficult delivery, within from five minutes to two weeks. Seemingly, the phenomenon may occur promptly and depends directly on the activity of the baby and indirectly on other factors only in so far as they affect this activity. It is not to be denied that small atelectatic areas may persist microscopically *in the lung for one or two weeks after birth without* being demonstrable on roentgenograms.

The typical shape of the newborn chest demonstrated by x-rays taken before initiation of respiration may be observed on gross physical examination particularly in babies with little subcutaneous tissue. Close clinical observation of the change in shape of the thoracic cage with breathing gives information relative to the probable aeration of the lungs.

Apparent respiratory distress certainly does not necessarily mean pulmonary pathology. In the newborn period, this symptom should always suggest as well the possibility of intracranial injury. X-ray of the chest is a necessity in distinguishing pulmonary from nonpulmonary entities.

The first requisite in resuscitation of the apneic newborn is the establishment and maintenance of a free airway. External stimulation may then be tried. The major point to be emphasized with such stimulation is gentleness; the risk of causing visceral trauma, increased shock and cerebral hemorrhage is very real. Oxygen is to be administered and warmth maintained. Utilization of technics of artificial respiration such as endotracheal intubation and insufflation requires a considerable amount of training and a high degree of practical skill. Considering the ease with which the newborn's tissues may be traumatized and the respiratory distress increased rather than relieved, such technic should be performed only with great care and gentleness despite the urgency of the situation.

The methods and the results of artificial respiration in atelectasis in prematurity vary from those in atelectasis in a full-term newborn. The small amount of oxygen absorbed through the walls of the trachea and larger bronchial radicals may sustain a baby's life for a relatively short period in some cases, but without alveolar aeration, death invariably results. Without immediate availability of x-ray facilities, as is the case in many hospitals, the efficiency of resuscitation must be evaluated in the light of clinical response. The apparent evidences of ade-

quate oxygenation and the maintenance of respiratory activity by the baby without external aid are the guides

We have found that the best results parallel the cooperation and coordination of the obstetric, pediatric, and anesthesiology departments Coordinated training and standardization of technics of resuscitation are prime requirements in the successful handling of respiratory difficulties in the newborn

We wish to acknowledge the support of this investigation by the Winthrop Research Fund

References

1 Birth Registry J A M A. 111 201B (Nov 26) 1938.

2 Russ J D and Strong, R. A Am J Dis. Child. 61 1 (June) 1941

3 Davis C H, and Stevens C W Am. J Obst & Gynec 20 73 (1930)

4. Smith, C A. J Pediat 20 338 (Mar) 1942

5 Wilson, R A Torrey, M A., and Johnson K. S. Surg Gynec & Obst 65 601 (1937)

6 Kreiselman J Am. J Obst & Gynec 39 888 (1940)

WAY FOUND TO LESSEN EAR DAMAGE FROM STREPTOMYCIN

Inner ear damage that sometimes is caused by streptomycin treatment might be prevented by desensitization, two Columbia University ear researchers reported at the meeting of the National Tuberculosis Association in New York They are Dr Edmund P Fowler, Jr , and Carl R Feind

Since tuberculosis patients getting streptomycin treatment must take the drug for weeks or months, the dizziness and other symptoms from its toxic effects on the inner ear may be troublesome Some patients are extremely susceptible, others very resistant to this effect of the drug In rare cases the hearing mechanism is also affected, but this is often reversible

In experiments with cats and salamanders, Dr Fowler and Mr Feind found that the toxic effect of streptomycin on the vestibular system of the inner ear can be modified by desensitizing the animals before giving a toxic dose —*Science News Letter, June 26, 1948*

HOUSE DUST MAY CAUSE INFANTILE ECZEMA

The possibility that house dust is an important cause of atopic dermatitis, or infantile eczema, was advanced by Jerome Glaser, M D , of Rochester, in a recent issue of the *Journal of the American Medical Association*

Infantile eczema is an allergy disease which, it is believed, is caused by direct contact of the skin with certain allergens, as well as by allergens which have been inhaled and which reach the skin through the blood stream An allergen is any substance which is capable of inducing allergy or specific susceptibility

Among the characteristics of atopic dermatitis are watery sores, scales and crusts, and itching or burning sensations The affliction is commoner in infants and children because their tender skins are more easily penetrated by allergens than those of adults

According to Dr Glaser, "the characteristic distribution of atopic dermatitis, with lesions worse on the face, the area of the arms below the elbows, and the area of the legs below the knees, suggests a possible contact origin" In view of this, he said, "it is tempting to consider that such lesions might be caused by a ubiquitous and powerful allergen, house dust, which could act either by contact or inhalation"

As further evidence of the importance of house dust in causing infantile eczema, Dr Glaser pointed out that "the often remarkably beneficial results of hospitalization are commonly attributed to avoidance of house dust as well as of other environmental allergens," adding that good results in the alleviation of the condition have also been attained by treating patients with injections of house dust extract

According to the article, there is no completely satisfactory treatment of infantile eczema and, therefore, "the problem is to do the best one can with a disease which is usually self-limited, with a tendency to spontaneous remissions and eventual recovery regardless of therapy"

Prophylactic, or preventive measures, such as avoidance of dust or irritating wool clothing, are considered important in the orthodox treatment of the disease Special baths, prepared by adding a cup or two of cornstarch to a tub of tepid water, are also recommended for early stages of the disease

The local application of paste of resorcinol, made up of one part zinc oxide, one part corn or arrowroot starch, and two parts white petrolatum, is highly satisfactory in more advanced or chronic stages In all cases of atopic dermatitis, the article says, it is well to put the patient on a simple elimination diet, which includes substitutes for cow's milk and the administration of vitamins A, D, and C

ESOPHAGEAL INTUBATION FOR REPAIR OF PHARYNGO ESOPHAGEAL DIVERTICULUM

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(From the Buffalo General Hospital)

PHARYNGO-ESOPHAGEAL diverticula, constituting about 98 per cent of all diverticula associated with the esophagus, are known to originate quite consistently at the same location [1-3] Specifically, the herniation occurs at a weak point in the posterior wall (pharyngeal dimple) at the juncture of the inferior constrictor and cricopharyngeus muscles.

Etiologically, the sac is presumed to form as a result of muscular incoordination Constrictors of the pharynx attempt to pass food by a spastic upper esophagus, with the result that the mucous membrane knuckles out posteriorly at the weak point between the two above-mentioned muscles Eventually weight of food in the sac causes it to angulate downward, displacing the esophagus to the left (most commonly) and placing the diverticulum opening directly in the path of the swallowed food

Repair of esophageal diverticuli is an exacting surgical procedure, made more difficult for the surgeon by the relative infrequency of the lesion Any maneuver which will identify the offending sac readily is apt not only to shorten the procedure but also to add to its safety Once the esophageal defect is located, a further complication arises from the fact that the enormously elastic esophageal wall, irregularly plicated in its relaxed state, offers little suggestion as to its disposition when distended It is obviously desirable to provide some means of distending the esophagus during repair Moreover, Shallow and Clerf point out the desirability of maintaining the pharynx and upper esophagus in their anatomic position during ligation of the sac neck and transplantation of the stump [4] To achieve this end they prefer to keep an esophagoscope in the esophagus during the entire period of repair

The anesthesiologist, employing familiar techniques is able to provide the means for identifying the sac, as well as for anchoring and distending the esophagus without the intervention of a third party, the endoscopist

As far back as 1900, Kocher and J S Mixter observed the constant displacement of the esophagus produced by a growing diverticulum, noting that a tube in the pharynx directed anteriorly and to the right would bypass the diverticulum and enter the slitlike esophageal orifice [5] Likewise, when the tube was directed posteriorly and to the left, it would enter the diverticulum As a matter of practical importance, so large is the diverticular orifice that any tube directed into the lower pharynx will find its way into the diverticulum, whereas, usually, it is only with great difficulty that a tube may be induced to enter the esophagus itself

Following the suggestion of Dr J Sutton Regan, of Buffalo, New York, these principles were employed in intubating the diverticula and esophagi of the two patients described

Technic

Anesthesia was induced with a minimal quantity of pentothal, followed by curare in amount sufficient for easy exposure of the glottis. Under direct vision, the esophageal diverticulum, whose orifice is in continuity with the lower pharynx, was thoroughly aspirated of food content to minimize the likelihood of aspiration as well as to simplify surgical removal Cocaine in 10 per cent concentration was then sprayed liberally over the pharynx and glottis (The Macintosh blade provides the widest angle of vision.) A small light on a flexible shaft (Cameron) was then placed in the diverticulum by directing it along the posterior wall of the pharynx until gentle resistance was met. Lastly, the trachea was intubated and the patient was then ready for draping Glottic intubation is reserved until last, since the tracheal tube would obscure the hypopharynx from the best view of the sac orifice In one of the patients, a retching movement during laryngoscopy caused the hypopharyngeal sphincter to open widely, presenting a full view of both the sac and the true orifice of the esophagus.

When the surgery has progressed to the point where the superficial fascia has been opened, exposing the structures of the neck, the light (previously placed) is turned on, brilliantly illuminating the diverticulum. The surgeon then proceeds to free the sac throughout its extent However, before the diverticulum is cut from its parent structure the light is withdrawn and the esophagus blindly intubated by directing a large Magill tube anteriorly and to the right down the pharynx. At this point the surgeon is in an advantageous position to facilitate the traversing of the small, slitlike esophageal orifice by gentle

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manipulation of the now delineated structures The tube need be passed only three or four inches beyond the orifice to anchor these structures for maintenance of their anatomic position, a factor of major importance in accurate repair according to Shallow and Clerf [4]

Obviously, the greatest care must be exercised to anchor the tube against loss into the stomach, since recovery would constitute a major procedure

Discussion

Several factors are to be considered specifically in the management of anesthesia for esophageal diverticula (1) danger of aspiration of diverticulum content, (2) trauma to recurrent laryngeal nerves, and (3) facilitation of sac identification for the surgeon

Regional block anesthesia (advocated by Harrington and formerly by Lahey) fulfills all three requirements in that (1) swallowing reflex is maintained to guard against aspiration, (2) talking during the dissection offers information as to the state of the laryngeal nerves, and (3) the patient is usually able to fill the diverticulum with air by swallowing, and thus aid in its identification [1 5] However, Lahey has discontinued regional block anesthesia for this procedure after reporting its use in 118 cases, stating that it is a trying ordeal for the patient and "far from satisfactory even in competent hands" [2]

General anesthesia, with a cuffed tube in place in the trachea, protects against aspiration and, with the technic employed here, assists in location of the diverticular sac Although general anesthesia fails in respect to the third point, offering no protection against laryngeal nerve damage, it must be noted that in one large series (140 cases) operated exclusively under regional block there were six temporary cord paralyses and one permanent paralysis, suggesting that regional anesthesia does not, in itself, guarantee the integrity of the laryngeal nerves [1]

Esophageal Intubation

Knowing that the distensibility of the esophagus permits passage of a food bolus of tremendous size, one may appreciate the difficulties of accurately closing a rent in its wall while the esophagus is in the relaxed state Swallowing in the immediate postoperative period places great stress upon the suture lines As might be expected from these features, the principal complications of this surgery, recurrences, fistula formation, and obstruction result from leakage by an unsatisfactory closure In the series of 140 cases referred to previously, 11 developed temporary fistulas, 10 developed angulation requiring dilatation, and five had recurrences [2] Others observed similar complications, and so frequent is postoperative obstruction that it is recommended that a string be left in the esophagus to aid in dilatation at a later date [3 5] The virtue of esophageal intubation is twofold first, during the actual repair, maintenance of the normal anatomic position of the pharynx and esophagus eliminates the distortion produced by a long-present, large diverticulum, second, in distending the esophagus itself, suture lines may be placed in the tissues corresponding to the disposition taken by the esophagus during swallowing, thus reducing the likelihood of stress during immediate postoperative swallowing By esophageal intubation, it is hoped that the chief cause for postoperative complications, i e , unsatisfactory apposition of edges of the sac neck, can be largely eliminated

Summary

Employing familiar technics, the anesthesiologist is able to assist the surgeon in the repair of pharyngo-esophageal diverticula by providing positive identification of the diverticulum sac and by anchoring and distending the esophagus during coaptation of cut edges, permitting more anatomic closure, and, it is hoped, thereby reducing postoperative complications

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References

1 Harrington Stuart W Surgery 18 66 (July) 1945
2 Lahey Frank H. Ann Surg 124 617 (Oct.) 1946
3 Homans Textbook of Surgery 3rd ed Springfield Illinois Charles C Thomas 1935 p 825
4 Shallow, T A. and Clerf Louis H. Surg., Gynec. & Obst 86 317 (Mar) 1948.
5 Lahey, F H. Arch. Surg. 41 1118 (1940)

AVITAMINOSIS B AFFECTS LIVER

Chronic deficiency of vitamin B complex may produce liver injury unless supplemented by a high-protein diet Doctors Victor A. Drill and Ted A Loomis of Yale University, New Haven, Connecticut, observe that dogs deprived of vitamin B complex and given a usual 20 per cent casein diet develop functional and histologic hepatic changes within twenty-seven weeks When 41 per cent casein is given such changes do not occur even after fifty weeks —*Modern Medicine, June 15, 1948*

STUDIES ON THE PHARMACOLOGIC PROPERTIES OF PROCAINE AND DI-ETHYL AMINO ETHANOL

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EXTENSIVE clinical usage has established the importance of procaine as the basic standard in the field of local and regional anesthesia In recent years this agent, injected intravenously, has been used in the therapy of a wide variety of painful disorders and other alterations of normal function in man, among them the disorders of cardiac rhythm observed during surgical anesthesia.[1-4] Despite the rapid accumulation of clinical experience with intravenous procaine fundamental knowledge concerning mechanisms of action, the distribution of the drug in the body and the precise mode of destruction or elimination has not been available. Furthermore, the necessity of withholding adequate quantities required for the desired therapeutic effect has been imposed upon the clinician by some of the unfavorable toxic properties of procaine

For these reasons, Brodie and his collaborators undertook a systematic study of the pharmacology of procaine with the aid of specially devised chemical methods for the identification of the parent material and the products of its hydrolysis, di-ethyl-amino-ethanol and para-amino-benzoic acid [5] In addition to establishing the manner of disposition of procaine in vivo it was desirable to determine whether the observed toxic effects were associated with procaine itself or with some product of its normal degradation It was entirely possible on the other hand, that the therapeutic action of procaine was exerted by a metabolite which was less toxic than the parent drug or if this were not the case that procaine itself could be altered by chemical substitution in the molecule to make it a more stable and effective drug

In studies upon normal man Brodie and his coworkers demonstrated that procaine is rapidly hydrolyzed to di-ethyl-amino-ethanol and para-amino-benzoic acid after intravenous administration [6] They found, further that urinary excretion is almost negligible as a method of disposition of the injected procaine Since 70 to 95 per cent of the para-amino-benzoic acid (free and conjugated) in procaine is recovered in the urine it was apparent that this material was largely unaltered in the body On the other hand amounts of di-ethyl-amino-ethanol equivalent to 20 to 35 per cent of the original procaine can be isolated from the urine When para amino-benzoic acid and di-ethyl-amino-ethanol are injected as such, quantitative recovery in the urine is identical with that described when these substances are administered in the esterified form as procaine It is evident therefore that the di-ethyl-amino-ethanol product of the hydrolysis of procaine is further metabolized in vivo in a manner as yet undetermined

The fact that the concentration of procaine in the plasma does not increase with continuous intravenous administration while that of the alcohol does, as clinical effects are noted suggests that the latter may be the pharmacologically active agent rather than the parent drug The role of para-amino-benzoic acid has not been completely investigated but the previously known behavior of this substance offers little support for the possibility that it exerts many of the actions commonly attributed to procaine Burstein *et al* suggested its possible efficacy in the prophylaxis against cyclopropane-epinephrine arrhythmias in the dog [7] No other studies are as yet available

It seemed desirable therefore to investigate the pharmacologic effects of di-ethyl-amino-ethanol upon man and laboratory animals. Observations early in the course of these studies indicated that the toxic effects were qualitatively similar to procaine, but large doses could be given intravenously before these were apparent. The margin of safety was significantly greater than with procaine The relative lack of toxicity of this material and its greater flexibility with regard to route of administration pointed the way to a comparison with the orthodox actions of procaine Comparisons were directed toward the properties which have been reported for procaine.

Procaine and many other tertiary nitrogenous compounds have several pharmacologic actions in common

Local Anesthesia —Procaine represents the basic example of the type of drug which produces anesthesia in tissues into which it is directly injected Appropriate anesthesia is obtained readily upon deposition about a nerve trunk Di ethyl-amino-ethanol appears to mimic procaine in this respect but is considerably less efficient in the production of significant local anesthesia

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far more effective clinical applications This preliminary report has given only the briefest indication of what has now become the expected attitude toward the pharmacologic investigation of a new drug It is virtually a new pharmacology with newer, more exacting and extensive criteria It is worthwhile to call attention to this, inasmuch as Dr Shannon and Dr Brodie have been leaders in developing these criteria

Of the evidence that has been mentioned, the possible role of di-ethyl-amino-ethanol as the effective ingredient of procaine certainly warrants a systematic study of its activity It is yet too soon, from the data presented here, to evaluate its use in cardiac arrythmias, vascular spasm, or painful states We hope that by the next annual meeting the authors will be able to report detailed results of the work of the group

One other factor the speaker mentioned deserves comment It is the second handicap in the study of procaine or any analgesic drug This is the existing weakness in our ability to define and study pain experimentally and quantitatively Most of us have long experienced the vagaries of pain syndromes via our use of therapeutic nerve block Clinical pains virtually defy experimental reproduction, particularly in laboratory animals Seemingly, human subjects with pain, either spontaneous or experimental, vary in their responses as widely as they vary in looks, personality, and mental make-up, making such studies infinitely more complex than the orthodox concept of pain threshold alteration apparently allows

References

1 McLachlin J A Canad M A. J 52 383 (Apr) 1946
2 Gordon, R. A. *Ibid* 49 478 (Dec.) 1943
3 Graubard, D J, and Ritter, H. H. Am. J Surg. In Press
4 Graubard, D J Robertazzi, R. W, and Peterson, M C New York State J Med 47 2187 (Oct) 1947
5 Burstein C L, and Marangoni, B A Proc Soc. Exper Biol & Med 43 210 (Jan) 1940
6 Brodie, B B Poet R and Lief, P A. The Fate of Procaine in Man In Preparation
7 Burstein, C L Marangoni B A. DeGraff, A C and Rovenstine, E A Anesthesiology 1 167 (Sept) 1940
8 Allen F M Am J Surg. 70 283 (Dec) 1945
9 Musicant, B Personal Communication
10 Bigelow, N, and Harrison I J Pharmacol & Exper Therap 81 368 (Aug) 1944
11 Brodie B B Rovenstine, E A., Lief, P A and Papper, E M The Utility of Di-ethyl amino-ethanol for Analgesia in Man In Preparation
12 Rosenberg B, and Kayden H Personal Communication
13 Appelbaum Emanuel Abraham, A and Sinton, W J A M A 131 1274 (Aug) 1946

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DOCTORS SAY BONE BANK HAS GREAT POSSIBILITIES

Bone preserved in a frozen state for weeks is of "definite value" in bone-grafting operations, Dr Leonard F Bush, Danville, Pennsylvania, and Dr C Zent Garber, New York, reported in the June 12 issue of the *Journal of the American Medical Association*

In an article entitled "The Bone Bank," the two doctors said that "if foods, serums, and other perishable substances could be kept in a low temperature freezing cabinet, we decided that perhaps this method could be used to preserve bone so that a constant supply would be available at all times" Experiments were undertaken, and it was found that human bone can be preserved, apparently indefinitely, in a freezer at minus 20 to 30 C

"Spinal fusions for scoliosis (abnormal curvature of the backbone) and disorders in the lower part of the back, the filling of large bone cysts, and the replacement of defects in bone are a few of the common problems in which large quantities of bone are necessary," the doctors stated in their article

In their experiments large chinchilla rabbits were used Control studies were made Thirty-two bone transplantations were made by 28 operations on 19 animals There were no casualties, and in only one wound was there a superficial infection

The experimental bone-grafting studies on rabbits showed that freezing at low temperature is a safe method of prolonged preservation of bone for grafting purposes Bone grafts three to six weeks after implantation proved successful Some of the bone used had been frozen from twenty-eight to eighty-four days

"Having proved that this method of preserving bone was successful in animals, we felt it was safe to attempt it in man," the article said "Thus all available clean fresh bone was placed in bottles and frozen at minus 25 C Because infection developed in one case, the bone is now kept for two weeks before using, while the donor remains under observation for evidence of developing wound infection" The doctors explained that by "exercise of diligence," considerable bone may be accumulated from many sources

In discussing the clinical results, the doctors stated that homogenous (having a similarity of structure) bone has been used in 126 operations in 104 patients "Of these, 24 operations were by direct transfer, refrigeration at plus 2 to 5 C was used in 37 instances, and the bone was stored in a deep freezer for 43 operations"

In the 104 cases in which donor bone was used, there were only four complications "The donor bone furnished a framework for the formation of new bone by substitution and by furnishing the necessary calcium for this new bone," the article stated

In discussing the paper, Dr J R Cobb says that from his experience at the Hospital for Special Surgery in New York, bone can be preserved indefinitely if it is kept sealed at a sufficiently low constant temperature without contamination

THE HISTORY OF INTERCOSTAL MUSCULAR PARALYSIS AS A PHENOMENON OF ANESTHESIA

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DURING deepening anesthesia respiration undergoes progressive deterioration In the human this regressive process is readily observed and serves as a guide during the administration of anesthesia.

In the first place the activity of the intercostal muscles becomes impaired In the supine position the anterior chest wall fails to become elevated at the instant the diaphragm contracts This is due chiefly to impairment in the efficiency of the contraction of the intercostal muscles Later, the elevation expansion of the anterior chest wall occurs only during the latter part of the diaphragmatic contraction Second, the chest wall fails to rise at all and later actually sinks This happens because the diaphragm working unopposed by the inactivated intercostal and certain accessory inspiratory muscles, indirectly pulls the upper anterior chest wall down while contracting

In the third place, as respiratory impairment progresses, the diaphragm itself falters The contraction becomes of shorter duration and assumes a jerky gasping character which later becomes ineffectual for ventilating the lungs The jerky descent of the diaphragm pushes the contents of the abdominal cavity against the anterior abdominal wall The wall is thrust upward with each corresponding contraction of the diaphragm The term abdominal respiration is used to describe this phase of respiratory activity during deep anesthesia

Finally, with respiration now greatly impaired primitive accessory respiratory muscles although no longer effective, become activated In general these are muscles developed embryologically from branchiomeres and associated in phylogeny with the development of the mouth and the related intestinal tract and lungs. The mylohyoid and anterior belly of the digastric serve as examples These muscles have an accessory function *of opening the mouth, which accounts for* their association with respiration

At this stage of anesthesia, occasionally at a much lighter plane resumption of activity in the mylohyoid produces a funnelling or trough-forming movement in the tongue and floor of the mouth in rhythm with each inspiratory discharge This movement can be directly observed or felt by the hand placed below the chin. Further increase in depth of anesthesia is soon followed by complete respiratory failure.

In 1925 Dr Albert Miller independently discovered and discussed paralysis developing in the intercostal muscles during deepening anesthesia [1] The importance of his observations was immediately grasped by Waters, Guedel, and others who were active in teaching anesthesia at the time As a result of work done chiefly by these three, intercostal paralysis as described by Miller became the constant guide to the commonly used levels of surgical anesthesia

The importance of Miller's observations should not be minimized He uncovered and made available for immediate useful application what was probably the most fundamental single observation in the teaching and understanding of anesthesiology Yet to attribute the discovery of intercostal paralysis to Miller in the year 1925, as is quite regularly done, is incorrect Moreover, it is interesting to note that isolated observations on this matter were made by several physicians including the first medical specialist in anesthesia, John Snow

Snow took up the study of anesthetics immediately after their introduction into England early *in 1847 After much observation, experimenta*tion and appraisal, in 1858 he published his famous book, "On Chloroform and Other Anesthetics [2] Snow judging by the wealth of original information on anesthesia recorded in this book, was an astute observer His facts were the more remarkable because there were no other books and few scientific papers on anesthesia at the time

On page 42 this statement appeared "There are some further effects of chloroform with which one becomes acquainted in experiments on lower animals If inhalation is continued after the *symptoms just described* (stertorous breathing, dilated pupils, relaxed muscles) are produced the breathing is rendered difficult feeble or irregular and is sometimes performed only by the diaphragm *whilst the intercostal muscles are paralysed*'

Again on page 90, Snow remarked that the administration of too much chloroform to humans resulted in quieting other respiratory muscles leaving the diaphragm to act alone muscular

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tone failed to fix the chest wall against the activity of the diaphragm, and, consequently, "abdominal respiration" developed At this point he did not specifically mention the intercostal muscles

Snow failed to interpret the value of his observation properly, a matter which was quite understandable He was exploring a new area wherein the most obvious happenings lacked an explanation The establishment of anesthesia required of the administrator, and undoubtedly of the patient, the ability to surmount a series of recurring and sometimes terrifying crises These major matters pre-empted the attention of the early administrators The nuances of respiratory activity, however fundamental to a proper understanding of anesthesia, had to await a later date for adequate emphasis

Paul Bert was the next to make relevant observations on this subject Bert was one of the great early respiratory physiologists and the successor to Claude Bernard in the chair of physiology at the French Academy of Sciences in Paris His book, *La Pression Barometrique*, published in 1879, reported about 600 experiments concerned with altitude physiology This work established Bert as the unchallenged pioneer in that field It is now considered a scientific medical classic Yet sixty years and the emphasis on aviation engendered by a second World War were required to achieve adequate recognition for the author A complete translation into English was made available in 1943 during the period of intense scientific activity in flight physiology

Beside his major interest, Bert conducted many studies in anesthesia, chiefly on animals under laboratory conditions He worked with nitrous oxide at increased atmospheric pressures Later he made studies of the effects on animals of carefully measured anesthetic mixtures of air with chloroform and ether In the middle 1880's he published a series of papers on the latter subject which showed his broad insight into problems related to anesthesia Beyond reporting sound observations on respiration and circulation, these papers showed concern with matters that have only recently come under intensive study by the anesthesiologist These interests of Bert included the effect of anesthetics on metabolism, on reflexes, and on other neurogenic phenomena

In a paper appearing in 1885, Bert made these remarks relating to thoracic movements, "abdominal respiration," and the dissociation of the two types of respiration under deepening anesthesia

"If we apply on a dog three pneumographs the first one at the level of the upper ribs, the second one over the lower ribs, the third at the umbilicus, we get the following results The upper costal respiration decreases little by little in depth progressively from the disappearance of the corneal sensitivity to death The lower costal respirations, predominant during the phase of stimulation, decreases considerably in depth at the moment of corneal anesthesia and becomes definitely inferior to the two other respirations The thorax collapses, and the pneumographic belt is no longer tight as in the beginning As death approaches, the lower costal respiration is practically zero On the contrary the abdominal respiration, whose depth decreased during the period of stimulation (light anesthesia), becomes predominant and very much so when anesthesia is well established The difference becomes more and more accentuated to its (abdominal respiration) advantage Up to the time of death abdominal respiration maintains its predominance

"Cutting the phrenic nerves arrests abdominal respirations and immediately the thorax, up to then almost immobile, resumes respiratory movements "[3]

The limited knowledge contained in the writings of Snow and of Bert constitutes the background of the subject up to 1899 In that year the distinguished neurologist, J Hughlings Jackson, and a young assistant, James Collier, aided by suggestions from Risien Russell and Howard Sturge, contributed an original and informative paper The title, *Remarks on Loss of Movements of the Intercostal Muscles in Some Cases of Surgical Anesthesia by Ether and Chloroform*, showed clearly the intent of the authors [4]

Since Jackson did not show preoccupation with problems related to anesthesia at any other time in his distinguished career, it is interesting to learn the manner in which he was led to write this paper The work resulted from the stimulation of a chance remark falling upon a trained and inquisitive mind

In 1895, Howard Sturge, a neurologist, remarked in Jackson's presence that Sturge had observed the breathing become "abdominal" under chloroform anesthesia Jackson, sensing a fresh problem in the behavior of the central nervous system, or possibly a solution to one already under his consideration, was quick to investigate He studied patients undergoing anesthesia and soon confirmed the fact that under deep anesthesia the breathing showed alterations, which he carefully described, that were related to paralysis developing in the intercostal muscles From Hewitt's first edition of *Anesthetics* he uncovered Snow's remarks on the subject that have already been quoted

Convinced now that he was on the track of an important observation, Jackson assigned to his young associate, James Collier, the task of pursuing the subject both by animal experimentation and further observations on humans

For his part Collier reported detailed observations on 60 humans subjected to deep anesthesia He noted the development of intercostal paralysis and described it as pictured today He mentioned the free reversibility of the paralysis as anesthesia lightened and deepened

At Jackson's suggestion and with the help of Dr Rusien Russell, he demonstrated the phenomenon on a dog and on a monkey It is interesting that the experimenters took the precaution to insert a tracheotomy tube in order to prevent respiratory obstruction and the confusion in interpretations of the chest movements that might otherwise have resulted Finally, he exposed the intercostal muscles directly and observed them actively contracting under light anesthesia and unresponsive when anesthesia was carried to the deeper planes

Except for the matter of establishing the relationship of intercostal paralysis to the various planes of anesthesia, this paper set forth every thing concerning intercostal paralysis that is of general knowledge today The exact description, the significance as a landmark of deep anesthesia, the ready reversibility the possibility of confusion with respiratory obstruction, and finally the demonstration of the phenomenon as a matter of *comparative physiology* were carefully set forth To Jackson and Collier belongs great credit for these many accurate observations

From this point only a few additional observations are necessary to bring the story up to date. Miller's independent discovery in 1925 has already been mentioned Guedel worked out the presently accepted description of planes and stages of anesthesia. He used Miller s observations on respiration as the primary fact to which the anesthesia scale was anchored

There has been discussion as to the manner in which this progressive and graded muscular and central nervous system paralysis takes place Miller referred to the phenomenon in 1925 as an ascending cord paralysis More recent neurophysiologic evidence would suggest that the respiratory changes of deepening anesthesia are related to a graded sensitivity existing in the cells of the respiratory reticulum. A given degree of narcosis would inhibit impulses arising from certain central neurones which were destined for respiratory musculature of lesser importance The same depth would merely alter, or scarcely affect at all, the impulses originating in the more fundamental respiratory neurones Modern conceptions attribute the deleterious effects of anesthetics and other poisons on the respiratory neurones to either a direct cellular depression or an impairment of synaptic transmission Finally, and quite recently Cassels and his associates have thrown some doubt on the absolute constancy of the progress of impairment and paralysis of intercostal muscular function under deepening anesthesia.[4] They observed 15 instances in 18,000 administrations where diaphragmatic paralysis developed without any concurrent impairment of intercostal muscular activity In connection with Cassels' observation, an earlier one by Paul Bert quoted in this paper is, at the least, of some interest Bert showed that if the phrenic nerve was exposed on an animal under going deep anesthesia and thoracic paralysis, immediately on cutting the phrenic nerve the previously paralyzed intercostal muscles resumed activity

Summary

The history and significance of the phenomenon of paralysis of the intercostal muscles as it occurs in deepening anesthesia have been outlined Several well known medical personalities are referred to in the sketch A major part was shown to have been played by the neurologist J Hughlings Jackson

References

1 Miller A H.: J.A.M.A. 84:201 (1925)
2. Snow John On Chloroform and Other Anesthetics, London John Churchill, 1858.
3 Bert, Paul: Compt. rend. Soc. de biol., 1885 p. 442
4. Jackson, J Hughlings and Collier James S.t Brain 22: 550 (1899)
5. Cassels, W H. and Gittelson L. A : Anesthesiology 9: 48 (1948)

BIRTH RATE IN 1947 HIGHEST IN A GENERATION

The birth rate in the United States has displayed marked recuperative power since 1933 when it reached the lowest point in our history From the minimum of 16 6 per 1 000 population in 1933 the recorded birth rate rose 56 per cent to 25 9 per 1 000 in 1947 the highest in a generation. The actual figure for last year including unreported births was 27 1 per 1 000 This increase may be attributed largely to the favorable economic conditions and to the special psychologic factors engendered by the war In the prewar years, that is, from 1933 to 1940 the birth rate in the United States increased only 8 per cent whereas from 1940 to 1947 it rose 45 per cent.

TREATMENT OF CUTANEOUS ANTHRAX WITH PENICILLIN

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FORTUNATELY, anthrax of humans in this country is rare, except in those locations where there are industries that handle hides, wool, and animal products, mainly from cattle, sheep, and horses, and, to a lesser extent, from swine, mice, fox, guinea pigs, and rabbits The occurrence is particularly high in factories using wools from foreign countries

In spite of the many sources of infection, the incidence of anthrax in humans is low in this country According to an analysis made by Smyth, 60 to 80 cases of anthrax occur yearly in the United States with a fatality rate of 17 to 22 per cent [1] A study of collected data shows that, between 1935 and 1940 in Massachusetts, there were 34 cases of anthrax with four deaths, a mortality of 12 per cent, while from 1940 to 1945 there were 21 cases with seven deaths, a mortality of 33 per cent [2] However, it was felt that the high mortality rate was due to ignorance of the disease on the part of physicians outside those serving in tanneries in Massachusetts

It is surprising to the authors that more cases do not occur in this country when one considers that anthrax spores are found in the soil and on the animals of all but five states in this country, Texas, Louisiana, South Dakota, and California being the most heavily contaminated regions In Russia and China, anthrax takes a heavy death toll among horses In Asia Minor, it particularly attacks the angora goat from which a great deal of wool and mohair is obtained Anthrax has proved to be an occupational hazard, especially among wool and leather workers, and sporadic cases have occurred from the use of shaving brushes

The organism, a gram-positive spore-forming, slender and nonmotile rod, is very resistant and can survive for fifteen years Even when buried deep in the ground for years, active spores can be brought to the surface by worms [3] To destroy the organism without injuring the products harboring it is still a major problem The carpet industry has tried various methods of disinfection, but all have proved either ineffective against the organism or so destructive as to make the fibers of the wool impractical for the manufacturing of carpets Even after dyes have been fixed in the fibers, the organism may remain alive Surprisingly, the highest incidence of anthrax at a local carpet manufacturer in Yonkers, New York, occurred in the spinning mill after the wool had been washed and dyed

In view of the increased incidence of anthrax in this country within comparatively recent years, direct federal legislation has been introduced for the prevention of the disease [4] Furthermore, the law requires that all material coming from infected centers must be properly disinfected, or otherwise treated, to reduce or remove the danger of anthrax infection It is felt that no procedure is, at present, entirely satisfactory Some have suggested the wearing of rubber gloves, the changing of clothes to and from work, and the cleaning of exposed parts before eating and after work, and the wearing of masks while on duty at such places in which wool products are manufactured As one can readily see, some of these procedures are quite impractical

Three types of anthrax exist among humans, cutaneous, intestinal, and pulmonary The cutaneous type is the most common and has a mortality rate of 16 to 23 per cent, while the other types, the least common, have carried a mortality rate of almost 100 per cent We are aware of only one case of anthrax meningitis that fully recovered This case was treated with antianthrax serum and penicillin and is included in this report A résumé of the last 82 cases of human anthrax from a local carpet manufacturer revealed 66 cases treated with antianthrax serum, one treated with penicillin and serum, nine treated with penicillin and sulfonamides, and six with penicillin solely There were four deaths one case was complicated with diabetes mellitus, and the other three died of anthrax meningitis The mortality rate in this group was 4 9 per cent Four of the deaths were in cases treated with antianthrax serum, while there were no deaths in patients treated with penicillin

The cutaneous form of the disease usually begins as a single lesion without pain but having a slight itching and burning sensation In approximately twelve hours, a vesicle is formed, about 0 4 cm in size, having a central umbilication and containing brownish fluid Soon the center is replaced by a necrotic, blackish eschar which spreads in all directions and is surrounded by an edematous, purplish skin, producing subjective symptoms of weight and pressure of the part involved The regional lymph nodes may be affected, and, if treatment is not immediately

instituted the anthrax organisms gain access into the blood stream, causing death in three to eight days

Years ago, excision of the cutaneous lesion was generally practiced, but at present such a procedure is thoroughly condemned Human antianthrax serum has been considered very effective and curative in most cases, but the frequent serum reactions are unpleasant to patients and the product is no longer manufactured

Gold, reporting on the treatment of 60 cases of human anthrax, states that sulfonamide compounds are a safe and reliable substitute for antianthrax serum.[6] However, he presents several cases in which sulfonamides appeared ineffective, and serum was required for recovery Of 48 patients with anthrax Lucchesi and Gilder sleeve treated 19 with serum ten with neoarsphenamine 15 with serum and neo-arsphenamine three with sulfanilamide, and one with sulfanilamide, serum and neo-arsphenamine [6] They found that neo-arsphenamine gave the best results in selected cases. They gained a definite clinical impression that patients treated with sulfanilamide did not fare as well as the others and complained of more discomfort which disappeared only after the drug was discontinued

In 1929, Dr Flemming announced his discovery of penicillin [7] He observed that the growth of Bacillus anthracis was inhibited in vitro by a penicillin concentration of 1 10 Thus compared with the inhibition of Staphylococcus aureus at a concentration of 1 40 and lack of inhibition of some gram-negative bacilli at a concentration of 1.5 Heilman, using penicillin inoculated 40 mice with Bacillus anthracis [8] Of the 40 mice 20 received treatment and 20 received no treatment. All the treated mice survived, and all the untreated died within ninety-six hours after receiving the inoculation Miller, Scott, Noe Madin, and Henley tested the efficacy of streptomycin penicillin, and sodium sulfadiazine in experimental anthrax infections in mice [9] They obtained a 92 per cent maximal survival rate with streptomycin, 58 per cent with penicillin, and only 5 per cent with sulfadiazine

Not until 1944 were the first cases of cutaneous human anthrax treated with penicillin. Murphy LaBocetta and Lockwood treated three cases solely with penicillin with a rapid and definite clinical response.[10] In each instance the inflammatory reaction about the lesion showed very prompt regression and the lesion itself underwent rapid involution They felt that 100 000 units was certainly the minimum effective dose, and a total of 200 000 to 400 000 units per day should evoke a satisfactory therapeutic response in the average uncomplicated case of cutaneous anthrax. Ellingson, Knaddull, Bookwalter, and Howe reported 25 patients with cutaneous anthrax treated with penicillin in total dosages from approximately 1,000,000 units to over 4,000,000 units.[11] Three patients also received sulfadiazine. In no instance was B anthracis isolated from the blood after twenty-four hours or more of treatment

The following are 17 consecutive cases of cutaneous anthrax in employes in a local carpet factory who were successfully treated with penicillin at this hospital during the past year (Table 1) Sixteen of the patients were men and one a woman When one considers that there is only a slight predominance of men over women workers at the factory the incidence of susceptibility among the former is much higher The disease occurred mainly in middle-aged individuals, but anthrax respects no age and can attack the very young as well as the very old Although more cases were seen in October, it is felt that there is no seasonal incidence and that this occurrence is nothing more than a matter of chance. More cases elsewhere have occurred in winter and early spring. Anthrax lesions occur mainly on the exposed parts of the body, and our report conforms with this observation. Ten of the 17 cases showed the lesions on the right side and it must be assumed that this side of the body in the right-handed individual is more apt to be exposed than the left

Sixteen cases showed both positive smears and cultures, and one case was negative on smear with a positive culture twelve hours later It was felt that obtaining a smear with a swab was unsatisfactory as insufficient material was obtained by this method In all cases the surface of the lesion was first swabbed with alcohol and then penetrated with a thick, short, platinum wire followed by a stout short platinum loop then smeared on a clean slide In some cases a superficial black crust had to be removed, followed by slight penetration with a platinum loop The contents of the deeper portions of the lesions contained more bacteria than the surface areas. In three cases blood cultures were done and in two of these a growth of anthrax was obtained. The average admission temperature in 17 cases was 99.8 F, and varied from 97 4 to 101.2 F After the administration of penicillin the average highest temperature during the patients' stay in the hospital was 100 7 F and varied between 99 and 103.8 F The average lowest temperature was 97 6 F The red blood cell counts on admission were essentially normal. The white blood cell counts showed an average figure of 8 101 with the highest 13,300 and the lowest 5 100 There was an average segment percentage of 63 Six cases out of 16 revealed slight traces of albumin in the urine

TABLE 1 —CLINICAL AND LABORATORY SUMMARY (PART I)

	Case	Sex	Age	Hospital Days	Site of Lesion	Days Before Reporting to Physician
1	J S	M	57	28	Upper lip, 8 hours later developed symptoms of meningitis[12]	1
2	W L.	M	35	15	Left cheek	1
3	J L	M	69	11	Left elbow	4
4	P C	M	48	33	Left cheek	2
5	M K.	F	40	11	Right thumb	1
6	J M	M	38	9	Right forehead	3
7	J N	M	48	8	Right arm	1
8	A. M.	M	65	15	Medial aspect right knee	3
9	J T	M	28	11	Helix of right ear	1
10	A. Z	M	52	12	Left thumb	3
11	R. B	M	36	6	Right thumb	3
12	J P	M	59	11	Right side of face	2
13	A. B	M	33	16	Right forearm	4
14	C P	M	29	8	Forehead	1
15	W C	M	25	9	Face anterior to right ear	2
16	R. R	M	53	5	Right forearm	1
17	P H.	M	40	7	Left forearm	2

TABLE 1 —CLINICAL AND LABORATORY SUMMARY (PART II)

	Case	Temperature (F) Admission	Lowest	Highest	Admission Blood Count Red Blood Cells	White Blood Cells	% Segments	Blood Culture	Urine (Presence of Albumin)
1	J S	101 0	98 0	103,8	5,300 000	9,100	73	Positive	Slight trace
2	W L	98 8	98 0	102 2	4,820,000	6,500	61	None	Negative
3	J L	98 0	98 0	100 0	4 500 000	11,000	60	None	Negative
4	P C	98 0	97 0	99 4	4 330 000	13 300	72	Positive	Trace
5	M K.	99 2	98 0	101 8	3 950,000	8 500	None	None	None
6	J M	100 4	97 8	100 4	5 310 000	9,700	57	None	Slight trace
7	J N	99 6	97 6	99 6	5 230 000	11 800	81	None	
8	A. M	101 2	97 6	103 4	4 200,000	4 500	65	None	Negative
9	J T	99 0	97 4	100 2	4 700 000	8 000	68	None	Negative
10	A Z	99 8	97 8	101 2	4 710,000	6 600	78	None	Slight trace
11	R. B	99 4	98 0	99 8	4,710 000	6,850	64	None	Negative
12	J P	99 0	97 0	103 0	4 680,000	7 600	76	None	Negative
13	A. B	99 0	97 6	99 4	4 800 000	6 500	69	None	Negative
14	C P	98 8	97 6	99 8	4 710 000	9 700	58	None	Negative
15	W C	98 8	98 0	99 0	4,200,000	5,100	50	Negative	Slight trace
16	R. R.	99 4	97 6	99 4	4 200 000	5 900	80	None	Negative
17	P H.	100 0	97 4	100 0	4 050 000	7 800	72	None	Slight trace

TABLE 1 —CLINICAL AND LABORATORY SUMMARY (PART III)

	Case	Smear of Lesion	Culture	Total Penicillin Units	Total Sulfamides (Grains)
1	J S	+	+	4 510 000	28 and 500 cc antianthrax serum
2	W L.	+	+	15 900 000	180
3	J L	+	+	14 100 000	0
4	P C	+	+	15 900 000	780
5	M K.	+	+	11 500 000	420
6	J M	+	+	9 800 000	180
7	J N	+	+	9,700,000	0
8	A. M	+	+	16 200 000	555
9	J T	+	+	13,600 000	75
10	A. Z	+	+	21,900 000	0
11	R. B	+	+	7 300 000	0
12	J P	+	+	16,500,000	540
13	A. B	+	+	13 200 000	0
14	C P	−	+	13 800,000	210
15	W C	+	+	14 500 000	30
16	R. R.	+	+	11,100 000	0
17	P H.	+	+	9,500,000	0

The average number of hospital days in the cases studied was twelve days, with the shortest five and the longest thirty-three

It is a policy of the medical department of the local carpet manufacturer to warn all employes of the danger of anthrax infection and to report all skin lesions promptly to the medical personnel The average time elapsing between the onset of the lesion to reporting to the physician was two days The suspicion of anthrax, the promptness in reporting to the physician, and the immediate institution of treatment were the three factors which made a malignant infectious disease a rather benign innocuous one with a relatively uneventful course in the hospital

All 17 cases were treated with heavy doses of penicillin, supplemented in seven cases by sulfadiazine, in two by sulfathiazole, and in one by sulfadiazine and antianthrax serum In general, each patient received from 100,000 to 300,000 units of penicillin every three hours intramuscularly, with a total average of 12,882,940 units during the hospital course All face and head lesions received, in addition to penicillin, sulfonamides because of the proximity of the lesion to the brain, where there was always a

possibility of meningitis occurring and also the possibility of the ineffectiveness of the penicillin, administered intramuscularly, reaching the meninges in strong enough concentration. In one case, in which there appeared to be meningeal irritation, penicillin was administered intramuscularly and intrathecally in addition to sulfadiazine by vein, and in a second case with definite meningitis, antianthrax serum, penicillin, and sulfadiazine were given. In view of the decreased sensitivity of some strains of B. anthracis to penicillin in vitro and the reported cases treated with this antibiotic being insufficient to draw definite conclusions it was felt safer to administer large doses of penicillin. No ill effects were noted during the course of treatment.

Summary

1. Anthrax of humans in this country is rare except in those localities where industries exist that handle hides, wool, and animal products mainly from cattle, sheep, and horses. It is definitely an occupational hazard, especially among wool and leather workers.

2. Federal law requires that all material coming from infected centers must be properly disinfected, or otherwise treated, to remove the danger of anthrax infection. However, it is felt that present procedures of prophylaxis are not entirely satisfactory.

3. During the past year, 17 consecutive cases of cutaneous anthrax in employes at the local carpet factory were successfully treated with penicillin, supplemented in nine cases with sulfonamides and in one with antianthrax serum and sulfanilamide. All but one patient were men, mainly middle-aged, with the location of the lesions chiefly on the exposed parts of the body and on the right side. Onset of lesion, days in the hospital, and laboratory findings are charted.

4. The suspicion of anthrax, the promptness of reporting to the physician, and the immediate institution of treatment were the three factors which made a malignant infectious disease a rather benign innocuous one with a relatively uneventful course in the hospital.

5. In general each patient received from 100,000 to 300,000 units of penicillin every three hours intramuscularly, with a total average of 12,882,940 units during the hospital course. All face and head lesions received, in addition to penicillin, sulfadiazine. One case was supplemented with antianthrax serum.

6. In view of the decreased sensitivity of some strains of B. anthracis to penicillin in vitro and the scarcity of reported cases treated with this antibiotic, it was felt safer to administer large doses of penicillin. No ill effects were noted during the course of treatment.

References

1. Cecil, R.: Textbook of Medicine. 5th ed. Philadelphia, W. B. Saunders & Co., 1942, p. 30.
2. Hardy, H.: New England J. Med. 236: 883 (June 5) 1944.
3. Washburn, H. S.: Anthrax, U.S. Dept. of Agriculture, Farmers' Bulletin 439.
4. Tice, F.: Practice of Medicine, Hagerstown, Maryland, W. F. Prior Co., 1927, Vol. 5, Chap. 16, p. 9.
5. Gold, H.: Arch. Int. Med. 70: 785 (Nov.) 1942.
6. Lucchesi, P. F., and Glidewell, W.: J.A.M.A. 116: 1506 (1941).
7. Flemming, A.: Brit. J. Exper. Path. 10: 226 (June) 1929.
8. Hellman, F. R.: Proc. Staff Meet. Mayo Clin. 19: 492 (Oct. 4) 1944.
9. Miller, E. S., Scott, E. B., Nos, H. A., Madin, S. H., and Henley, T. F.: J. Immunol. 53: 371 (Aug.) 1946.
10. Murphy, F. D., LaBoccetta, A. C., and Lockwood, J. S.: J.A.M.A. 126: 948 (1944).
11. Ellingson, H. V., Raddall, P. S., Bookwalter, H. L., and Howe, C.: J.A.M.A. 131: 1105 (Aug. 3) 1946.
12. Grimm, Joseph R.: Am. J. Clin. Path. 17: 719 (Sept.) 1947.

AMERICAN COLLEGE OF SURGEONS APPROVES USE OF NURSE ANESTHETISTS

The Board of Regents of the American College of Surgeons at a meeting on February 22, 1948, adopted a resolution commending the services of nurses who have had special training in the administration of anesthesia and recommending the continuance of training courses in this field for nurses. The resolution reads as follows:

> The American College of Surgeons regards with deep concern the actions of some physician anesthesiologists in giving the impression to the laity, in the public press that it is unsafe for experienced nurse anesthetists to conduct surgical anesthesia. While it supports the increasing tendency of having physician anesthesiologists in charge of surgical anesthesia, it deplores at this time any propaganda for the elimination of the trained nurse anesthetist. On the contrary, the American College of Surgeons is of the opinion that in view of the inadequacy in number of the physician anesthesiologists and in view of the splendid record of achievement of the nurse anesthetists, institutions engaged in the training of nurses for this purpose should be encouraged to continue their programs.

ELUSIVE MENTAL CASES

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THERE are very light, often elusive, forms of mental disorders, met by every physician without exception, whether he is aware of them or not There is nothing extraordinary about them, as they are the most frequent of all the disturbances of the mind They may inconvenience, annoy, or plague the patient as entities by themselves, without the admixture of any other trouble They may accompany some real organic illness or cause it or originate from it They are by no means obscure or difficult to diagnose if one is prepared to look for them and to recognize their presence However, they are usually disregarded by many practitioners and even by some psychiatrists It is an error to consider them as insignificant True, they are sometimes not very troublesome and need no attention, but many become quite complicated when neglected As they form an inextricable part of the personalities of a large number of our patients, they shape and modify and color all complaints and symptoms If we fail to notice them and treat the more apparent physical conditions only, there is a strong resistance against our best therapeutic methods

Sometimes they are unintentionally improved or even cured by the general practitioner because of a transference unknowingly established between the latter and the health-seeker Some of our medical men, I am glad to say, without any psychiatric knowledge, look for the mental abnormality and discover it instinctively, as the best doctors have always done since the earliest ages of medicine In the majority of the cases, overlooking these mental disorders results in a faulty approach and an inability to heal the condition for which the sick person comes Nor is it certain that, without any intentional planning, the subtle relationship between physician and patient will be the right one and will be helpful If left to chance, it may prove to be unfavorable and quite harmful or, at best, without any effect at all

I shall avoid the word "incipient" for these light mental conditions Although some of them may advance with time into outspoken neuroses and psychoses, many remain unchanged and in the same stage throughout life

These cases may be classified in the same way as the more advanced and more typical ones of a similar nature, or they may not be sufficiently developed to be classified If systematizing is at all necessary, this writer believes that for nonpsychiatrists it will be more practical and easier to understand them if we accentuate either their most outstanding symptoms or the most apparent causes or factors which have contributed chiefly to their existence Thus, instead of grouping them into the uncertain and overlapping chapters of neurosis, psychoneurosis, manic-depressive psychosis, schizophrenia, etc , or the tendencies to these mental diseases, it is preferable to see them as cases largely influenced by the following

Congenital factors, conflicts between parents and children, marital difficulties, educational problems, frustrations, sexual troubles, economic insecurity, psychosomatic conditions, involutional situations, senescence, alcoholism, general maladjustment, trends to amorality and misbehavior, etc Although avoiding monotony and repetitiousness, we shall try to keep as close as possible to the more typical cases

Beginning with the psychosomatic approach, here are some random cases of people who, at first, and properly so, addressed themselves to general practitioners and nonpsychiatric specialists

Case Reports

Case 1 —A single young man, an accountant, went to his doctor, complaining of an "exhausted feeling" and that his heart was "beating, pounding fast" He added that this never happened when he was happy and contented, but only when, for one reason or another, he was sad and frustrated He had learned also that this condition improved by itself when he took a few hours off from his work and rested Whatever difficulties he had in his life became worse through fear of a possible heart disease However, the fact that his heart symptoms were due to his mental state never occurred to him and was unknown to his physician

It was true that he had attacks of tachycardia but was otherwise in good trim physically With few exceptions he had been working steadily and behaving normally He had friends among both sexes and was popular with them, rarely missing a party or an affair He did not drink

Nothing betrayed his inner feelings, his unhappiness, and his effort to adjust They were really most elusive He was treated extensively, but the ups and downs in his condition led his doctor to the belief that there was something else behind the tachycardia The patient was then sent to a psychiatrist

The initial thrust to this patient's mental depression was the death of his father This happened while the young man was serving in the Army He, of course, had to agree to his mother a request for his discharge. In assuming these new economic and emotional responsibilities relaxation changed to tenseness. He was busy and paid less attention to his girl, who resented his newly acquired seriousness and left him for another man

The patient began to show compulsions which he never confessed to anyone until the psychiatrist uncovered them. He could not stand certain people and certain of their actions or motions They were small matters, but they made him miserable, for example, pointing to somebody or something, touching one s lips with a pencil, proximity to anyone etc. He ate much less, because the food was contaminated He slept little because he lay awake thinking of the futility of life We might call this a psychosomatic case in a schizoid individual

His intelligence was above the average Under ordinary circumstances his heart was normal as was his blood pressure Family and personal history, as far as his present condition was concerned, were negative

A complete physical and mental cure took place when his younger brother returned to civilian life and assumed the responsibility of the family and when he himself got married

Case 2 —A woman of 41, married for twenty years, without children, was well until two years ago when she underwent a hysterectomy for the removal of a large fibroid tumor Soon after this uncomplicated event she began to complain of incoherent symptoms which were apparently unrelated to the operation. There were vague pains' at points distant from the pelvis for instance in the neck or the occipital region There were also spells of headache which she strictly differentiated from the other attacks and which she had never had before the operation. Her 'lassitude and general "weakness" failed to conform to her fine appearance and to the negative laboratory findings However together with the sensation that 'something was crawling" over her body she felt the old preoperative heaviness and pressure in the abdomen and accused the surgeon of not having done his job completely Psychologically this was evidently a wish fulfillment. On the other hand she mourned the removal of her uterus and cried when she was alone Outwardly she was adequate. Her work in the house did not suffer and she behaved as if nothing had happened to her Of course her menses had ceased but curiously enough there were no direct menopausal signs

Sedatives and estrogenic medication, administered for over a year, had not the slightest effect One very conscientious physician went over the entire case carefully investigated everything he could had all the necessary laboratory work done repeatedly and arrived at no conclusion

At the first conversation it was revealed that while before the operation she had had only latent expectations of motherhood, they had now blossomed out into a strong longing to give birth to a child. As the last hope had definitely and irretrievably departed she fostered a longing which probably only a lukewarm desire before now became a need Was this a subconscious self-deception a covering up of her great satisfaction at the operation s result, or was she really unhappy at the thought that she could never conceive?

She was advised to adopt an infant and as soon as she did all her unpleasant symptoms disappeared without leaving a trace.

Naturally this patient had a hysteric trend but it was magnified by an important organic change.

65 WEST 05TH STREET

HALF YEAR MORTALITY RATE LOW

The health record among *U.S life* insurance policyholders during the first half of this year has continued at or near the record low of last year with indications that maintenance of the current experience could see a *new record low mortality rate* established this year the Institute of Life Insurance reports. During the early months of the year there was an upturn in the death rate, but since then conditions have improved somewhat

In the first six months of 1948 new record lows were estimated for several death causes, the Institute said. 'Tuberculosis *continued its long* sustained decline this year's death rate from this cause so far being 40 per cent under that of ten years ago

'The death rate from the communicable diseases of childhood showed even more striking ten-year gains The 1948 improvement in all major childhood diseases except measles, over last year s record low brought the rate to a level about one *fifth that of* ten years ago

'Influenza also has abated this year its death rate being well under last year's and about one third *that of ten years ago Pneumonia* shows a slightly lower relative toll this year

"The accident toll is lower again this year with motor vehicle accident fatalities to date being nearly as low as during the war years when auto mileage was restricted and new cars were few

'Heart disease and cancer deaths were the two black spots on the half year health record both showing increases The cardiovascular renal disease group—this being the broad category classified as the area of heart and circulatory afflictions and related ailments—showed a material increase Had it not been for the increase caused by these maladies the half year over-all death rate would have been clearly at a new record low

HYPERTENSION. A MANIFESTATION OF HYPERTENSIVE VASCULAR DISEASE

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BECAUSE the arterial pressure can be measured by a simple and quantitative procedure, it is customary to regard an elevated blood pressure and its modification as of prime importance in the evaluation and management of hypertensive vascular disease As a result, considerable emphasis is often placed on the degree of hypertension as an index of severity and as related to the development of complications and to prognosis

On physiologic grounds, hypertensive vascular disease may be defined as a disorder in which the arterioles possess the functional potentiality for abnormal resistance to the flow of blood Although such increased resistance results in an elevation of the diastolic and mean arterial pressure, it is obviously improper to regard the blood pressure change—the effect of increased peripheral resistance—as the prime or only disturbance

Clinically and pathologically, hypertensive vascular disease may be associated with a variable autonomic nervous system component, with cardiac hypertrophy, and with augmentation of arteriolar and arterial degenerative processes It is the purpose of this discussion to review the evidence as to whether hypertension is but an incidental manifestation or whether the degree of blood pressure elevation can be correlated with these other events which frequently characterize the course of hypertensive vascular disease in man

Blood Pressure in Hypertensive Vascular Disease

A study was undertaken of 250 subjects with established hypertensive vascular disease followed at frequent enough intervals for detailed analysis The average blood pressure at the time of diagnosis was 182/108, the average at the time of last observation (two to forty-one years later with an average period of observation of twelve years) being 202/116 This latter figure excluded critically ill or terminal cases In other words, although there was considerable variation in individual cases, the general tendency of the blood pressure was to increase but slowly throughout the years of observation

In the group studied, the initial level or the maintained height of the blood pressure could not be correlated either with symptoms, rate of progression, or with subsequent development of complications For example, there was no correlation whatsoever between the frequency and intensity of headaches and the degree of hypertension Blood pressure values, never below 200/120, were found to be compatible with two and more decades of comparatively good health Only one observation proved to be an exception a rapid increase in the blood pressure over a period of months was often associated with the rapidly progressive phase of the disease

As the majority of blood pressure determinations are those casually recorded under the specific conditions of a medical examination, it is practically impossible to obtain data under carefully standardized conditions Hence, one cannot exclude the possibility that the unrecognized peaks of extreme hypertension after stress or emotion may be related to progression of the underlying disease process It is, nevertheless, difficult to attach a primary etiologic significance to such a variable factor as the level of the blood pressure

The blood pressure of hypertensive as well as normal subjects exhibits innumerable fluctuations in which age, position, activity, obesity, and particularly emotional state play an important part In fact, the range of lability in some hypertensive individuals far exceeds that observed in normotensives One patient, whose usual blood pressure readings were about 180/100, showed variations from 130/80, following rest and sedation, to 260/150 with excitement and apprehension It must be emphasized that maintenance of pressure in the arterial system is physiologically dependent on many intrinsic as well as secondary regulatory mechanisms, even during the hypertensive state

The systolic blood pressure is usually increased in hypertension, but systolic values within normal limits may occur It is even possible under certain conditions for the hypertensive state to exist without hypertension In response to rest alone, many hypertensive subjects have a reduction in tension to normal values, in one in-

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stance to 90/52. Fever may obliterate hypertension for days, and a normal blood pressure may persist for many months after a hypertensive subject has developed a myocardial infarction (even in the absence of congestive failure) or a cerebral vascular accident.

Autonomic Nervous System Component

There are numerous reasons for entertaining the concept that there is a variable disturbance in the autonomic nervous system in hypertensive vascular disease.

Vascular hyperreactivity, as judged by cold pressor and other tests carried out in 20 hypertensives and a similar number of normal controls, was much more frequently associated with an elevated blood pressure. Vasomotor instability was a conspicuous feature in a small percentage of the group of 250 patients closely followed. Some hypertensive subjects were found to be extremely sensitive to orthostatic phenomena induced by experimental stimuli such as phlebotomy or vasodilator drugs. The symptomatic relief and clinical improvement which may follow bilateral thoracolumbar sympathectomy suggests an autonomic component. Transient vasospasm may be part of the hypertensive picture. Rigid sodium chloride restriction, studied in six individuals with hypertensive vascular disease, was demonstrated to modify peripheral resistance but without affecting the patient's ability to respond abnormally to autonomic or neurogenic stimuli.[1] The depressor response to sympathicolytic drugs was pronounced in some hypertensive individuals and not in others.

Ogden has accumulated data indicating that, even in experimental renal hypertension, there is evidence of an extrarenal, neurogenically operated, and sympathetically mediated mechanism.[2] It is also of interest that preliminary studies of the sympathetic ganglia removed from hypertensive subjects at the time of sympathectomy suggest the presence of vascular proliferations which were not found in normotensive individuals.[3] The possibility that the synthetic drug nor-adrenalin is identical with sympathin-E and the pressor properties of this agent have raised obvious analogies that are under investigation. For example Holtz and his coworkers claim to have found increased amounts of nor adrenalin in the urine of 10 of 23 hypertensive patients.[4]

Thus, patients with hypertensive vascular disease appear to possess a variable autonomic component responsible for vasoconstrictive phenomena superimposed on some other mechanism causing increased peripheral resistance. Whether these two factors originate from the same causative source or are completely separate is not clear. Nor can it be determined as yet which one is responsible for the complications of hypertension and its variable progressive course. However, it is traditional to regard lability of blood pressure response as a feature of early hypertension rather than advanced disease. Similarly, the impression gained from the present series suggests that autonomic hyperreactivity is more commonly associated with relatively benign hypertension.

At any event, the most conspicuous feature of the autonomic component is its inconstancy. Witness the variable effects of pressor and depressor tests and of sympathectomy. Autonomic hyperreactivity cannot, therefore be ascribed to the mere presence of an elevated blood pressure. Unless one regards hypertensive vascular disease as representing a group of disorders of different etiology the autonomic component must be interpreted as being a secondary or concomitant phenomenon associated with the fundamental underlying process.

Cardiac Hypertrophy

In the study of 250 hypertensive subjects, an increase in size of the cardiac area was recorded by x ray in 71 per cent at some time during their course. No correlation whatsoever to the intensity or duration of the disease or the height of the blood pressure could be made. In some instances, confirmed at autopsy, cardiac hypertrophy was conspicuously absent. Hearts weighing 300 Gm. and less have been encountered even after twenty years and more of marked hypertension. One woman with hypertension of 225/140 showed no progression in the increased cardiac silhouette by x ray sixteen years later when the degree of blood pressure elevation was unchanged. Yet others exhibited rapid hypertrophy over a short space of time with blood pressure levels in the 150/90 to 160/100 range.

Cardiac hypertrophy is so frequently encountered that an association with hypertensive vascular disease cannot be denied. The hypertrophy, at first confined primarily to the left ventricle, consists of an increase in size as well as hyperplasia of muscle cells but without multiplication of capillaries or alterations in vascular tissue, with the result that relative ischemia may ultimately occur. Although experimental studies in animals and postmortem studies in man may not be true reflections, there are reports which suggest that hypertrophy is accompanied by increases in intra- and extracellular water and sodium and decreases in such intracellular constituents as potassium, phosphorus, creatine, and phospholipins.

The work of the hypertensive heart is increased by virtue of the increased resistance unaccom-

panied by compensatory changes in cardiac acceleration or output Of necessity, there being no commensurate alteration in vascularity, the hypertrophied heart is laboring under an added strain, but, contrary to popular belief, there are numerous reasons why one may doubt that the increased size of the heart is solely related to the degree of hypertension or the work of the heart

Although the role of dilatation and underlying myocardial disease cannot always be clarified, the following observations at least pose a question as to the cause of cardiac hypertrophy The strenuous and prolonged muscular exercise of athletes, it is now agreed, may cause some increase in cardiac size but not invariably greater than the development of other musculature Marked hypertrophy may follow relatively minor valvular lesions, insufficient to add much extra burden to the heart Experimentally, partial constriction of the aorta may produce hypertrophy in animals in a few weeks, even though the actual work of the heart is apparently altered less than in hypertensive disease The production of hypertrophy by overdosage with desoxycorticosterone acetate and salt, its accentuation in experimental nephritic animals which have received desoxycorticosterone and sodium chloride, and its rapid appearance in acute glomerulonephritis with or without hypertension raise doubts as to the mechanism of its production [5]

These arguments favor the view that cardiac hypertrophy cannot be attributed alone to the elevation of blood pressure or to the work of the heart, particularly when long-sustained hypertension is unassociated with cardiac enlargement on occasion The evidence at hand points at least in part to some more fundamental cause

Arteriolosclerosis

Other than at autopsy, arteriolosclerosis can be demonstrated only through involvement of the retinal or renal areas In the group of 250 patients studied, some degree of arteriolar irregularity or arteriovenous compression in the optic fundi appeared in 94 per cent, with hemorrhage, exudate, or papilledema apparent in 19 per cent Again there was no correlation with the height of the blood pressure, and in some instances hypertension of long duration failed to produce any retinal alteration Although the more extensive vascular changes were generally associated with advanced disease and a poor prognosis, in a few subjects even severe retinitis showed conspicuous regression without drop in blood pressure Some cases of accelerated hypertension with severe arteriolar nephrosclerosis were comparatively free of retinal arteriolosclerosis so that it was found wholly impractical to grade the hypertensive state on the basis of the eyegrounds

In the present series, about one third of the hypertensive group eventually exhibited some renal abnormality in the form of relative polyuria, nocturia, diminished concentration power, and albuminuria, with or without the presence of urinary red blood cells Nitrogen retention developed in 5 per cent The absence of any direct relationship to the blood pressure level was again a noticeable feature Accelerated hypertension developed in one patient whose blood pressure never exceeded 180/100, another individual whose tension invariably stayed above 200/120 for more than twenty-five years was free of renal symptoms or signs of impaired function

Although renal involvement is usually a bad omen, several notable exceptions have been observed One patient had persistent albuminuria for fifteen years, another lived seven years after nitrogen retention was first discovered, and yet another case, proved at autopsy to be nephrosclerosis, maintained abnormally high nonprotein nitrogen values in the blood for more than ten years before he died

It is generally agreed that hypertensive vascular disease is more than casually associated with arteriolosclerotic lesions in the majority of instances The arterioles involved include primarily the kidneys, pancreas, periadrenal tissues, and liver, whereas other areas, e g , the spleen are often spared or only minimally involved or are seen so commonly in normotensive subjects as to be interpreted with caution In the accelerated phase of the disease, necrosis, advanced hyalinization, and petechial hemorrhage may be added to the arteriolosclerotic picture These findings are most conspicuous in the kidneys, frequently in the choroid and retina, and, only to an irregular and lesser extent, in other tissues and organs

Almost all investigators agree that organic changes in the renal arterioles occur in a high percentage of cases but that a small group of hypertensive subjects exhibit no demonstrable abnormality It is also established that even renal arteriolosclerosis may occur in the absence of hypertensive vascular disease or hypertension

As summarized recently by Evelyn, to regard hypertension as the sole cause of arteriolosclerosis is obviously untenable, inasmuch as arteriolosclerosis is encountered among normotensives [6] To feel that arteriolosclerosis is a process of aging causing hypertension when it affects the kidneys, a view expressed by Goldblatt and others, is still open to question, because even renal arteriolosclerosis may occur in the absence of hypertension [7] Evelyn does admit that "since there is no reliable method of calculating

the degree of impairment of renal circulation which corresponds to any observed degree of renal arteriolosclerosis, acceptance or rejection depends on differences in the interpretation of the functional significance of the observed pathologic changes "

The available data leads us to a third and more likely point of view, that propounded by Kimmelstiel and by Bell[9] Again, in Evelyn's words, "hypertension and arteriolosclerosis are independent processes which often undergo parallel development, and are capable of intensifying one another in the later stages of their evolution"

Arteriosclerosis

In this series of 250 patients 18 per cent complained of cardiac pain at some time during their observed course myocardial infarction occurred in 9 per cent and electrocardiographic changes indicative of myocardial damage developed in 38 per cent Cerebral vascular accidents occurred in 12 per cent of this group and were frequently unrelated to stress or exertion Some long-sustained hypertensives lacked any evidence of large artery disease at autopsy It should once again be emphasized that no consistent relationship of any of these complications to blood pressure levels or duration of the disease could be established

In any survey of the pathologic picture of a chronic or protracted disorder, it may be observed that changes are often attributed to the basic disease when in reality they may merely represent concurrent events that have no dependent relationship It is still debated as to whether arteriosclerotic changes are only associated lesions such as are frequently found in comparable age groups or whether they result from some unfavorable influence exerted by the disorder on the arteriosclerotic process

The frequency of coronary artery disease cerebral vascular accidents and peripheral vascular changes among hypertensives is advanced as an argument that degenerative alterations in arteries are related to abnormal elevations of blood pressure. Others feel that a certain degree of pathologic change would give rise to more serious complications in subjects with an elevated blood pressure

The balance of opinion favors the thesis that hypertensive vascular disease augments the production of arteriosclerosis. Experiments have been conducted to show that normal arterial walls can withstand pressures twice as great as those ever found in hypertension. Experimental increases in hydrostatic pressure have produced more marked atheromatous changes in rabbits than could be induced by high cholesterol diets alone This argument is further borne out by the majority of careful analyses of autopsy material, such as those of Wilens[10] Although age and nutritional state were independently related to atherosclerosis, this author found that the incidence of severe atherosclerosis was considerably higher in all hypertensive groups as compared with the corresponding ones without hypertension

Discussion

It is apparent to all that death in hypertensive vascular disease is due chiefly to cardiac hypertrophy, arteriosclerotic complications, and, on infrequent occasions, to arteriolar nephrosclerosis Death is obviously not the result of an elevated blood pressure alone For this reason the question as to whether hypertension leads directly to these complications or exists as an incidental manifestation is an important one. If an elevated blood pressure is responsible for ultimately fatal sequelae then measures aimed at lowering the arterial tension have a therapeutic place If hypertension is but one manifestation of a diffuse and variable disorder then attention should be focused elsewhere

The evidence summarized in this review points strongly toward a group of independent processes related to or augmented by hypertensive vascular disease not necessarily related to each other and so variable in the degree and rate of their appearance that a direct correlation with the level of the blood pressure is conspicuously absent. Rather than look upon the blood pressure as responsible for other complications it would be preferable to regard it as one of a group of effects, all stemming from the same underlying disorder It follows therefore, that an evaluation of therapeutic procedures which lower the blood pressure should take into consideration the mechanisms whereby this effect is achieved and that treatment, to be successful, must do more than reduce the height of the blood pressure. Indeed one may question the practical benefit of lowering the arterial tension unless the progress of vascular pathology is modified at the same time

It must be kept in mind however, that this hypothesis is based on inconclusive information in several respects No data are available on the relation of basal blood pressure levels or on the unrecognized peaks of tension following stress There is still no convincing evidence to exclude the possibility that prolonged drops in blood pressure may alter the progress of the other aspects of the disease

One thing is clear from the available information Too much emphasis has been placed on the height of the blood pressure in its relationship to the complications of hypertensive vascular

disease Too often patients are warned that, because their arterial tension is markedly elevated, they are subject to grave danger unless immediate measures are taken Of 100 patients questioned with reference to their first knowledge of hypertension, 68 were acutely frightened by the information they received or the manner in which it was imparted to them The data at hand do not justify such an attitude, nor should the physician, regardless of the evidence, be guilty of adding to fear and apprehension in a variable chronic disease which frequently is compatible with decades of normal living

Conclusions

1 Evidence is reviewed, supported by clinical data, indicating that an elevated blood pressure is but a manifestation of hypertensive vascular disease

2 Autonomic hyperreactivity, cardiac hypertrophy, arteriolo- and arteriosclerosis are frequently but not invariably part of the hypertensive picture

3 The lack of any consistent relationship of these complications to each other or to the degree of hypertension suggests that they are produced or are augmented by separate mechanisms independent from those which elevate the blood pressure

4 Evaluation of therapy must consider modification of these mechanisms rather than emphasis on blood pressure levels

References

1 Perera G A. and Blood D W J Clin Investigation 26 1109 (1947)
2 Ogden, E Bull New York Acad Med 23 643 (1947)
3 Lattes R. Am. J Path. 24 177 (1948)
4 Holtz P Credner K. and Kroneberg G Arch. f exper Path u Pharmakol 204 228 (1947)
5 Knowlton, A I, Loeb E N Stoerck H C and Seegal B C J Exper Med. 85 187 (1947)
6 Evelyn K. A Am. J M Sc 214 312 (1947)
7 Goldblatt, H Physiol Rev 27 120 (1947)
8. Kimmelstiel P and Wilson C Am. J Path 12. 45 (1936)
9 Bell E T Renal Diseases Philadelphia Lea & Febiger, 1946
10 Wilens S L Arch Int Med 79 129 (1947)

PREPARE GLOSSARY OF TERMS USED IN ATOMIC ENERGY

To better inform the physician, the Council on Physical Medicine of the American Medical Association has prepared a glossary of terms used in atomic energy and nuclear physics

The introduction to the pamphlet says that "nuclear physics as it develops will have important consequences to the practicing physician New types of injury may require treatment, new hazards will require prevention, and new methods of treatment, diagnosis, and research will be introduced In attempting to inform himself about recent discoveries the physician is constantly baffled by the new vocabulary which contains some words too recent or too technical to be found in older or less specialized dictionaries The present glossary is intended to be helpful in this respect"

VICTORY FOR BIOTICS OVER DISEASE IS SEEN

Future developments in the new science of antibiotic therapy may make it possible before long to combat, if not to eliminate, all plant, animal, and human disease, Dr Selman A Waksman told the National Tuberculosis Association meeting at the Pennsylvania Hotel recently

Dr Waksman is a professor at Rutgers University and the New Jersey Agricultural Experiment Station in New Brunswick.

After surveying the field of antibiotics, Dr Waksman said "One is inclined to become optimistic and assert that before long all human and animal diseases, and possibly also plant diseases, will be combated if not completely eliminated"

This, he cautioned, was an optimistic point of view, but an impartial examination of recent developments in isolating soil-growing micro-organisms and applying them to disease in man "have fully served to justify the optimistic outlook"

Dr Waksman pointed out that a mere fraction of the micro-organisms had been examined They grow in soil of varying types throughout the world in pools of water, on food products, and in a number of other substrates

Only two of the antibiotics isolated so far have become true chemotherapeutic agents (streptomycin and penicillin), Dr Waksman said, but the recent discovery of chloromycetin, aerosporin, and polymixin, in addition to subtilin, nisin, and others, gives promise for the future

Each of the antibiotic agents apparently is effective against specific disease germs, he added, and germs not affected by presently known substances may be combated by micro-organisms to be discovered

Some disease germs become resistant to antibiotic agents in the course of treatment, and Dr Waksman said medical science needed to develop more potent agents or combinations of antibiotics that will not permit resistance to develop

"The prospects for antibiotics are promising, the future is bright indeed," he said

SOME CONTRIBUTIONS OF PHYSICAL MEDICINE IN POLIOMYELITIS

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(From the Department of Physical Medicine, Massachusetts General Hospital, Boston Massachusetts)

IN THE absence of any specific treatment for patients with acute anterior poliomyelitis, the salvaging of all undamaged or recoverable neuromuscular units is the major aim of treatment in the convalescent patient. The therapeutic procedures utilized for this purpose are primarily in the field of physical medicine. Application of heat in various forms and particularly therapeutic exercises have been generally accepted as established methods of treatment. The basis for the use of these physical methods, however, has largely rested upon clinical observations. Heat has been found effective in relieving pain in extremities, together with rest, either with or without the use of mechanical aids for immobilization. The tendency to muscular shortening has been dealt with usually by splints or braces in the early stages and later by passive stretching. Strengthening of weak muscles is obtained by prescribing graded resistance during active muscular contractions. This in brief is the rationale for the use of these well-known physical procedures.

In recent years the lay public, patients, physicians, and all those treating poliomyelitis patients have been made aware of the possibilities of different and more effective methods of treatment or even cures. This has focused the attention of scientific investigation on the problems of understanding the fundamental mechanisms of dysfunction of muscles in this disease. Considerable research on this problem has been done in many different medical centers which has been made possible largely through the aid of the National Foundation for Infantile Paralysis and similar agencies. I would like to review for you the results of some of these studies which relate to physical therapeutics. Although they are of primary interest to the field of physical medicine, where the knowledge is put to practice, the research is a cooperative effort of a team of specialists interested in the poliomyelitis patient including the pediatrician, neurologist, orthopedist, and physiatrist, together with those primarily concerned with the basic sciences such as physiology and pathology.

Research

Electromyography.—One of the controversial and still unsolved problems of infantile paralysis is an explanation of the common finding in muscles of hyperirritability, pain, and tendency to contracture, frequently described merely as muscle "spasm." Seeking objective methods of observation, electromyography has been utilized in many different centers in this country and abroad, and results have been obtained which are quite comparable.[1-11] It has been possible to record an abnormal amount of electrical activity from muscles apparently at rest and in a position of maximum relaxation during the early acute stages of the disease. The amount and distribution of this electrical activity seemingly bears no constant relationship to the presence or absence or degree of muscular weakness at the time of the observation. A still more striking finding during the acute stage of poliomyelitis is the hyperirritability of muscles upon stretching. It is possible by only moderate passive stretching to obtain abnormally high voltage electrical discharges in muscles of varying degrees of voluntary motor power from nearly normal to marked paresis. Completely paralyzed muscles however, or at least ones which eventually are found to be paretic are usually electrically silent.

A different type of electrical record is obtained in the later stages of the disease. In weak muscles, most commonly those with only 20 to 60 per cent of normal power, a characteristic finding is that of discrete high voltage diphasic spikes discharged from resting muscles and similar in appearance to electromyograms obtained from muscles whose peripheral nerves are regenerating with only partial reinnervation present. This type of electromyogram may be observed many years after the onset of the disease in patients with only partial return of power. In cases with good recovery this type of irritability disappears, and only normal voluntary action potentials are recorded.

A further type of electrical abnormality is that of minute discharges of very short duration characteristic of the fibrillation of denervated muscles as occurs after section of a peripheral motor nerve. Such irritability cannot be ascertained clinically as there is no visible muscular contraction, but its presence is of some prognostic value as will be discussed later.[11]

When one attempts to correlate electromyographic records with the clinical findings, we can make only hypothetical conclusions since

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there is still not enough information available concerning the pathologic changes during the recovery stage of the disease Electromyograms in the acute stages, particularly from muscles with only minimal or moderate paralysis which show signs of sensitivity clinically, present a record of fairly continuous high frequency, high potential discharges which have the same appearance as those obtained from muscles splinting an injured bone after a fracture We are not certain of the origin of this involuntary muscular activity, but one possible explanation is disease in the sensory reflex arc, particularly of the dorsal root ganglion, which might initiate reflex contraction of motor units which are only slightly involved The irritability to passive stretching might be explained on the same basis or, perhaps more likely, on the basis of lesions of the motor side of the reflex with partial involvement of anterior horn and/or internuncial cells in the motor pool with loss of some normal inhibitory activity [12 13] The action potentials seen during the later stages of recovery are similar to those from muscles seen during regeneration of peripheral nerves and may indicate some actual axonal regeneration, or they may simply represent discharges from muscles containing only a very few functioning motor units We are more certain about the origin of the low voltage, short duration discharges, as they resemble so closely the fibrillation of denervated muscle They probably illustrate the innate irritability of muscles deprived of nerve supply and consequent hypersensitivity according to the law of denervation of Cannon [14]

Another controversial point in the clinical picture of poliomyelitis is concerned with the loss of well-coordinated control of muscles It is well known that substitution of muscle groups, not ordinarily concerned with the motion tested, may occur when weak muscles or even strong ones contract during attempts to exert maximum effort It is also known that in the presence of pain, muscles with antagonistic action are frequently brought into action, apparently as a splinting mechanism Electromyography has revealed that the cocontraction of agonist and antagonist in patients with partially paralyzed muscles in poliomyelitis is a common occurrence [2] It has also been shown by electromyography that this may disappear with improvement in muscle strength and muscle re-education, thus providing an objective rationale for such treatment [10]

Electromyography has been of prognostic use in establishing the degree of likely recovery in any particular muscle group [11] In general, muscles with a high degree of electrical activity, particularly high potential spontaneous discharges at rest, are most likely to improve in strength On the other hand, complete electrical silence or the presence of denervation fibrillation is a poor prognostic sign [11]

Electrical Excitability—Another method of studying the functional capacity of muscles is by measuring their irritability to measured amounts of electrical stimulation This is of particular importance where one wishes to establish that the lack of motion is due to disease of anterior horn cells rather than only apparent paralysis as has been suggested and described under the term of "alienation" Electrical stimulation has an accepted role in distinguishing hysterical paralyses from organic ones, and hysterical reactions, as might be expected, are occasionally observed in patients with poliomyelitis as with the other types of infection As a rule, however, changes in the chronaxie or the strength-duration curve give us objective evidence of damage to the lower motor neuron and are, accordingly, useful adjuncts in evaluation of the degree of involvement, in following recovery, and in prognosis The technics of electrical stimulation and electromyographic recording have been combined to study conduction velocity of nerves and transmission of impulses across the neuromyojunction [15] This represents another important method of quantitative evaluation of neuromuscular function still only partially explored

Treatment

Heat—These methods of investigating neurophysiologic processes in patients with poliomyelitis may be carried into the clinic and utilized to evaluate physical therapeutic procedures We know that muscles are hyperirritable and that pain is present, and so we have some basis for the use of heat We know that heat will increase the pain threshold and have some slight effect on muscle irritability as measured electromyographically [16 17] Heating does not always, however, have beneficial effects on muscular strength and, when applied to an extreme degree, may be deleterious, particularly to the epiphyses of growing bone [18 19] There appears to be no marked superiority in the application of heat in one form as compared with another in relieving muscle pain or spasm

The effect of drugs on muscular function may also be measured electromyographically, but I will omit a discussion of this subject as it is not, strictly speaking, physical medicine [17]

Muscle Testing—The accurate measurement of muscle strength in patients with poliomyelitis is of primary importance Muscle testing is used to assist in diagnosis, as a record of the status of function and progress, in prognosis, in

accurate prescription of muscle re-education, and also as a basis for reconstructive surgery.[20] The manual tests originally devised by Lovett, when standardized have a surprising degree of accuracy and repeatability when done by experienced technicians.[21] However, newer methods involving electronic measuring devices have been devised which may prove to be superior and enable us to pick up finer degrees of weakness and to study better the recovery process and effective therapy.[22]

Exercise Muscle Re-education.—The decision as to which muscles to exercise, the position during exercise, and the degree of resistance is based on the knowledge obtained from our muscle strength tests. The general principles governing technic of muscle re-education are fairly well standardized in hospitals and centers treating poliomyelitis patients and in schools training physical therapists. Variations occur as to the amount of passive stretching permitted in the early cases and also as to the time when ambulation is permitted. In any event, good muscle re-education is based on sound knowledge of muscular anatomy and function and skill is developed only with experience in handling many patients with varying degrees of involvement.

Development by the patient of "muscle sense" as well as strength is part of the aim of therapy. Usually, in the early stages, heavy loading of muscles is omitted, as this tends to favor substitution and mass contraction of muscles. At this stage the emphasis is on maintaining normal motor patterns by passive and active assisted exercises even though muscles are severely weakened. The goal is that of maximum coordination and any activity which maintains coordination and adequate kinetics of the motions involved is permissible. Patients must always be carefully followed to detect and prevent habits of faulty bodily mechanics which may lead to deformities such as hyperextension of the knee and twisting of the trunk. It is essential that patients be followed by those trained in observation of articular mechanics so that necessary support or prescription of activity can be provided to pace the therapeutic program to the needs of the patient. I would like to reiterate for sake of emphasis that there is no substitute for accurate evaluation of musculoskeletal mechanics in the over-all therapeutic program consisting of physical medicine, protective braces, and finally corrective surgery if necessary, for patients with residual paralysis.

It is extremely difficult to evaluate the effectiveness of any new type of therapy or modification of physical treatment in this disease because of the natural tendency to spontaneous recovery with only the minimum of supportive therapy. For example, it has been shown that all but the completely or nearly paralyzed muscles will usually show a remarkable degree of return of power with nothing more than adequate rest, support, and graded activity. Undoubtedly, many more patients have complete recovery or no significant residual weakness with no treatment other than a few days of bed rest. With this knowledge in mind one would therefore hesitate to recommend very radical or energetic physical treatment of a nonspecific nature during the acute stage of the disease. Our knowledge of the presence of abnormalities in the cerebral spinal fluid persisting for weeks or months after the onset of the infection gives further support to a therapeutic program which allows for a maximum conservation of energies to aid in establishing immunity and reparative tissue reactions.

It seems probable that many patients do not receive the optimum physical treatment resulting in completely efficient use of the residual neuromuscular units. With this thought in mind groups of patients have been studied in late convalescence, or even those who have residual weaknesses of many years duration to determine whether special exercise technics might be of value in improving function. DeLorme has shown that weak atrophic muscles, following immobilization necessitated by trauma or surgery can be quickly brought back to normal strength by systematic exercises employing the principle of progressive resistance.[23] Exercises of this type make use of maximum loads on the muscle with few repetitions of the individual exercises and have been used successfully by weight-lifters to develop muscles to a remarkable degree. This method of muscular strengthening has been studied by us in a group of patients with residual paralysis from poliomyelitis and gratifying improvement has been noted. In order to grade the exercises systematically special apparatus has been developed allowing accurate knowledge of muscle loads.[22] The muscle selected for exercise ordinarily must have sufficient power to move the affected joint through a nearly normal range of motion. If strength is insufficient to allow movement against the forces of gravity counterbalance may be employed without diverting from the principle of developing muscle power based on the premise of relatively few repetitions of exercise at maximum muscle load or resistance. In poliomyelitis patients the actual load of the muscle may be less than that of the weight of extremity when counterbalancing is employed, but still the exercise is a near maximum exertion comparable to that of weight-lifters with normal muscles and extremely heavy loads. Studies of

improvement in muscle strength in a series of such late cases of poliomyelitis have revealed that muscle strength can be improved to a significant degree by this method of exercising, as judged by ability to walk greater distances without fatigue and use less apparatus for support Even though manual testing showed little change, the use of this type of exercise has apparently a definite place in the therapeutic program aimed at developing maximum muscular efficiency

Other contributions in the field of physical medicine are those aimed at rehabilitation in an over-all sense, including problems of mental and social adjustment to handicaps when present The morale of patients with poliomyelitis is notably excellent in most cases This is probably not a matter of chance alone nor simply due to the fact that the majority of the patients are children with remarkable powers of adjustment Much credit is due to those treating the patients by endowing a spirit of optimism and encouragement Constant vigilance and skillful guidance in the therapeutic program is essential, however, to prevent progressive deformities which otherwise would obliterate any rehabilitation program based on social needs alone Further advances can be expected when our knowledge of the fundamental nature of the pathogenesis of neuromuscular dysfunction is increased or when a specific cure is discovered

Summary

The major aim of treatment of the convalescent patient is the salvaging of all available neuromuscular units The measures utilized are in the field of physical medicine Recent research, particularly electromyographic studies and other quantitative electrical measurements of muscle function, have provided a scientific basis for the use of heat and therapeutic exercise New technics for improving muscle strength, even in late cases, have been developed by means of progressive resistance exercises

References

1 Schwartz, R. P , and Bouman H. D J A.M A 119 923 (1942)
2 Watkins A L Brazier, M A B , and Schwab R. S *Ibid* 123 188 (1943)
3 Lundervold A , and Seyffarth, H Acta psychiat et neurol 17 69 (1942)
4 Buchthal, F and Honcke P Acta med Scandinav 116 148 (1944)
5 Schwartz R P , Bouman, H D , and Smith W K. J A M A 126 695 (1944)
6 Bouman, H. D , and Schwartz, R. P New York State J Med 44 147 (1944)
7 Watkins, A. L. Journal-Lancet 64 233 (1944)
8 Brazier, M A B , Watkins A L and Schwab R. S New England J Med 230 185 (1944)
9 Kohn P M Zucker, E M , and Toomey, J A. J Nerv & Ment. Dis 102 438 (1945)
10 Watkins A L and Brazier M A B Arch Phys Med. 26 69 (1945)
11 Huddleston O L , and Golseth, J G *Ibid* 29 92 (1948)
12 Kabat., H., and Knapp M E J Pediat. 24 123 (1944)
13 Fischer E. Arch Phys Med 27 333 (1946)
14 Cannon, W B Am. J M Sc 198 737 (1939)
15 Hodes, R. Unpublished data.
16 Wells, H S. Arch. Phys Med 28 135 (1947)
17 Watkins A. L , and Brazier, M A. B *Ibid* 26 325 (1945)
18 Hall, V E. Munoz E and Fitch, B *Ibid* 28 493 (1947)
19 Wise C S Castleman, B , and Watkins, A L Unpublished data
20 Bennett, R. L Physiotherapy Rev 27 242 (1947)
21 Daniels L , Williams M and Worthingham C Muscle Testing Techniques of Manual Examination Phila delphia, W B Saunders Company, 1946
22 Unpublished data.
23 DeLorme T L and Watkins A L. Arch Phys Med , (May) 1948

POLIO FIGHTERS ARE MOBILIZED FOR OUTBREAK

Polio fighters all over the country are mobilized in preparation for the usual summer outbreak of this crippling childhood disease

In a series of 300 "grass roots" conferences, public health and hospital officials and other professional personnel from each community will be brought up to date on latest methods for fighting the disease From two to a dozen conferences will be held in each state The conferences are sponsored by the National Foundation for Infantile Paralysis

It is too early to say yet whether there will be a big epidemic of the disease this summer And there is no specific cure for it, nor any way of preventing polio epidemics, Basil O'Connor, president of the National Foundation for Infantile Paralysis, pointed out But, he said, "we have learned that early diagnosis and prompt modern hospitalization can do much to halt the ravages of this crippling disease "

The preparedness meetings are being planned so that hospital beds, special equipment, and trained personnel will be available for emergencies and so that health and medical authorities will know where to get nurses and physical therapists and about the National Foundation's epidemic aid teams and emergency equipment pools

For the first time, Mr O'Connor said, pools of equipment such as respirators (iron lungs) and hot pack machines will be strategically located at San Antonio, Texas, Atlanta, Georgia, Boston, Columbus, Ohio, and Denver —*Science News Letter, June 12, 1948*

THE SURGICAL TREATMENT OF ADVANCED CARCINOMA OF THE CERVIX

ALEXANDER BRUNSCHWIG M.D , New York City
(From the Memorial Hospital Center for Cancer and Allied Diseases)

THE treatment of carcinoma of the uterus varies, depending upon the site of the primary lesion In general, the treatment at present for carcinoma of the cervix is irradiation While this form of therapy has made great progress in the past and is capable of effecting cures, the fact remains that the majority of women who develop carcinoma of the cervix die of complications resulting from failure of its control Once irradiation has been carried out and the neoplasm persists or recurs, further irradiation will rarely be successful in controlling the growth. Yet repeated attempts to do this are the usual course of events, and not infrequently, repeated irradiations entail disturbances which are as distressing to the patient as the disease It would appear that little consideration has been given to the possibilities of radical surgery under these circumstances. The prejudice against surgery in the treatment of cervical cancer would seem to be very strong Undoubtedly this is due to the emphasis that was placed on the high mortality (15 to 20 per cent) that accompanied the surgical attack upon cervical cancer in the early decades of this century In the past two decades much progress has been made in the supportive treatment of the surgical patient. Thus, major procedures in the abdomen entail much less risk than in the era when the classical series of radical hysterectomies by Wertheim and Bonney were developed

In the course of an investigation of the possibilities of modern surgical treatment for carcinoma of the cervix, it was felt that the selection of patients for operation should be minimal consistent with good surgical judgment A number of patients were received who had had irradiation therapy and in whom there was persistent or recurrent disease, still localized to the pelvis and without evidence of distant spread The surgical problems varied with the extent of local disease and for purposes of discussion they will be classified as follows

1 When the recurrent or persistent neoplasm is confined to the cervix and/or the tissues in the immediate vicinity, there would appear to be no contraindication to the performance of a radical supravaginal hysterectomy with pelvic lymph node dissection.

2 When the recurrent or persistent neoplasm has extended to one or both lateral pelvic walls and affords the impression of a 'frozen pelvis' on bimanual examination it has been my experience that the impressions from "within and above" the pelvis as obtains through a laparotomy incision are very frequently different from those which obtain from bimanual vaginorectal pelvic examination and that a "frozen pelvis' found upon the latter examination does not prove to be 'frozen" when dissection is carried out from above and within the pelvis. A plane of separation can usually be developed, and the neoplasm and its extensions circumvented

3 When the above conditions obtain and at laparotomy it is found that one ureter is involved the radical panhysterectomy with node dissection is carried out, and, in addition, the involved portion of ureter is resected The upper ureter is implanted into the sigmoid colon

4 When bladder is invaded, a radical panhysterectomy with lymph node resection and total cystectomy is performed The entire procedure may be carried out in one operation. During the course of the operation, the ureters are transected and implanted into the pelvic colon The uterus, adnexae, pelvic nodes, and areolar tissue and urinary bladder having been freed except for their attachments to the pelvic floor the abdominal incision is closed, the patient put in the lithotomy position, elliptic incisions made to encompass the introitus, and the structures referred to previously are removed from below The perineal wound is closed tightly except for a hard rubber drain

5 When recurrent neoplasms involve both bladder and rectum it is necessary in these desperate situations to remove the pelvic colon uterus, vagina, recurrent tumor, and bladder A laparotomy is performed, both ureters are transected, and areolar tissues and nodes along the external and common iliac vessels are freed and retracted mesially The hypogastric arteries and veins are ligated and divided, the urinary bladder is freed entirely from the symphysis down to its attachment to the urogenital diaphragm The lower sigmoid is transected First one and then the other of the ureters is implanted into the sigmoid by modified Coffey I methods. The upper end of the transected sigmoid is then brought out of the abdomen through the midline wound, the latter is closed and the patient placed

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in lithotomy position Elliptic incisions extending from the symphysis pubis anteriorly to the tip of coccyx posteriorly are then made, and the entire freed contents of the pelvis are removed from below The perineal wound is closed tightly except for hard rubber drains at each angle of the wound One interesting feature of this operation is that peritonealization of the pelvis is impossible since all of the pelvic peritoneum has been removed, but this entails no complications, since all the intestines which fall into the pelvis become adherent throughout most of their extent and there is no opportunity for sharp kinking to produce obstruction This very extensive operation has been carried out on 22 occasions for various types of recurrent carcinoma of the female genital organs which involve bladder and rectum There have been five surgical deaths, all in the first one to two weeks following operation No patient succumbed in the operating room Thus, the surgical mortality has been 23 per cent Of those patients surviving, palliation has been gratifying indeed and some of them have been returned to almost normal physical activity Some of these patients, in addition to their usual housework, have returned to part-time employment outside the home

It must be remembered that this group of patients represented the most advanced type They had all had some form of irradiation therapy repeated once to several times, and some of them had had conservative surgical operations No other form of therapy was available that afforded reasonable promise of palliation Operation not only resulted in removal of large masses of neoplastic tissue which in themselves produce certain discomfort hardly ameliorated by sedation, but the fistulae, vesicovaginal or rectovaginal, or both, that were present were done away with, thus relieving the patients of the discomfort due to these factors

Comment

Carcinoma of the cervix remains within the pelvis for long periods before producing metastases outside the pelvis This is well illustrated by the findings in 65 autopsy protocols from the Memorial Hospital of patients dying of carcinoma of the cervix Half of these patients presented no macroscopic evidence of spread beyond the pelvis at time of necropsy They had died of uremia or infection or a combination of both Thus, it would appear that an attempt to deal with persistent or recurrent carcinomas after failure of irradiation therapy might be worth while

Years of experience are necessary with these types of operations in order to arrive at very definite impressions as to the real additional longevity that might be afforded to these unfortunate sufferers The brief experience so far obtained, however, clearly indicates that appreciable degrees of palliation are possible Until some biologic method of control of these growths is discovered or unless some newer types of irradiation are developed, bold surgical attempts to remove these recurrent or persistent neoplasms would seem to be in order Those experienced in the management of these advanced cases realize full well that they have nothing to lose and everything to gain by undergoing a surgical procedure that might afford them prolongation of life in comfort Furthermore, with the benefits of modern supportive treatment for the surgical patient, the immediate risks are not out of line with the end that it is hoped to achieve

The surgical mortality statistics in this initial series of cases may be cited at this time There were 12 patients who received the radical panhysterectomy with lymph node dissection for persistent or recurrent cervical carcinoma, there was no surgical mortality There were 37 patients in whom a ureter or a portion or all of the bladder were removed, a portion of the rectal colon with panhysterectomy, or in whom pelvic colon, recurrent tumor, all of the vagina, remaining uterus, adnexae, and urinary bladder were resected There were nine operative deaths, thus the surgical mortality was 24 per cent This would compare favorably with the surgical mortality in the initial attempts to deal with cancer of the stomach, esophagus, cardio-esophageal region, and lung It would seem, therefore, that radical surgery may prove to have something to offer in patients with carcinoma of the cervix, recurrent, after attempts have been made at control by irradiation therapy or the more conservative standard types of operation

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COURSE IN NURSING OFFERED BY DEPARTMENT OF HOSPITALS

The Division of Nursing of the New York City Department of Hospitals has a twelve-month course.

It is open to women from 18 to 50 who have graduated from elementary schools and are fitted, physically and temperamentally, to be nurses Students will receive maintenance, uniforms and $10 a month, and a two-week vacation

CLINICOPATHOLOGIC CONFERENCES

FOURTH MEDICAL DIVISION OF BELLEVUE HOSPITAL New York City

Date. January 26, 1948

Conducted by EMANUEL APPELBAUM, M.D

Bacterial and Virus Pneumonias

Case 1—F D, a 70-year-old white man, was admitted to Bellevue Hospital for the second time on December 3, 1947 because of cough and bloody expectoration

The past history revealed that the patient was in Bellevue Hospital in 1945 because of a myocardial infarction. Since then he had been moderately dyspneic on exertion and had orthopnea There was no ankle edema He took digitalis sporadically until three days prior to his present admission.

The present illness began four days prior to admission with a "cold," running nose, and sore throat. He remained ambulatory and on the day prior to admission had a shaking chill with a temperature rise to 102 F He continued to have chilly sensations, began coughing, and expectorated blood-streaked sputum. Just prior to admission he received some penicillin, but the amount was not known.

Physical Examination.—The temperature was 103 6 F, the pulse rate 113 respirations 24 and the blood pressure 100/70 The patient appeared well nourished, had a hacking cough and did not appear to be in distress The positive physical findings were moderate injection of pharynx, dullness at the left base with crepitant rales over the left lower lobe posteriorly and laterally with bronchial breathing, and few moist rales at the right base, point of maximal impulse in fifth intercostal space outside the midclavicular line, grade III systolic murmur over entire precordium, loudest at apex. The second aortic sound was louder than the second pulmonic sound, and the ventricular rate was 113 per minute

Laboratory Data.—The white blood count was 16 950 with 3 polymorphonuclear leukocytes 86 stab forms, 4 lymphocytes, and 7 monocytes. On the day following admission the white blood count was 20,250 with 6 polymorphonuclear leukocytes, 86 stab forms and 8 lymphocytes The red blood cell count was 4,460,000 with 13.8 Gm of hemoglobin Blood cultures on three successive days following admission were all negative The erythrocyte sedimentation rate was 96 mm. per hour, the blood nonprotein nitrogen 32 mg per 100 cc. The blood Mazzini reaction was 4 plus, the blood Wassermann was negative Cerebrospinal fluid analysis was negative Urinalysis showed specific gravity of 1 025, 3 plus albumin, but otherwise negative Nose and throat cultures many pneumococci which did not type, Staphylococcus albus, Streptococcus viridans, gram positive bacilli and gram negative micrococci The electrocardiogram showed left axis deviation and left bundle branch block.

X-rays—"Pneumonitis at right lower lobe possibly left lower lobe, not clearly visualized and partially obscured probably by cardiac silhouette."

Course—The patient was started on penicillin 50,000 units every three hours and a salt-poor diet and was given 2 cc of mercuhydrin intramuscularly, oxygen, and digitoxin 0.2 mg daily His temperature dropped from 103 0 to 101 4 F within twelve hours and then promptly rose to 104.6 F The patient now presented some cyanosis of the lips and nail beds and appeared acutely ill and in a shocklike state. The temperature continued to range between 104 4 and 104 6 F for another sixteen hours, at which time sulfadiazine 2 0 Gm initially and 1 0 Gm every four hours, was instituted This produced little change in his condition The temperature rose to as high as 105 F and continued to range between 103 6 and 104 6 F on the third hospital day On the third hospital day the patient appeared very restless, and bubbling rales were heard throughout both lung fields The pulse and blood pressure became imperceptible but returned after administration of 50 cc of 50 per cent glucose intravenously Congestive heart failure which became prominent on the second hospital day became more marked on the third hospital day, and another 2 cc dose of mercuhydrin was administered It was further advised that both the penicillin and sulfadiazine dosage should be increased However before this additional therapy could be employed the patient expired

Case 2—W R. a 67 year-old white man was admitted to Bellevue Hospital for the second time on November 28 1947 because of chills and fever of two days duration

Past history revealed that the patient had an appendectomy for acute appendicitis at Bellevue Hospital twenty-five years ago He had had swelling of his ankles in the past, but there had

been no dyspnea or orthopnea and no knowledge of heart disease

The present illness began two days prior to admission, when the patient felt hot and developed a shaking chill and pain in the left anterolateral chest while waiting in line for food at the Municipal Lodging House This pain persisted and was aggravated by deep inspiration He had an occasional cough, but there was no expectoration or sore throat During the two days prior to admission he had had numerous shaking chills

Physical Examination—On admission, the temperature was 105 4 F , the pulse rate 85, respirations 30, and the blood pressure 145/70 The patient was a poorly developed, obese man who appeared chronically ill and who, during examination, experienced a shaking chill The positive physical findings were chest expanded poorly bilaterally, with medium moist rales at the right base and bronchial breath sounds over the right upper lobe The heart rate was 85 with a normal sinus rhythm, a grade III systolic murmur at the apex and base and second aortic sound louder than the second pulmonic, extremities showed excoriations and scabs over both legs, and there was a left varicocele and hydrocele

Laboratory Data—On admission the white blood count was 8,850, with a marked shift to the left Urine showed a specific gravity of 1 025 with 3 plus albumin and three to six white cells and three to five red cells per high power field and was otherwise negative The blood nonprotein nitrogen was 28 mg per 100 cc , the Mazzini reaction was negative Blood cultures on the first two days were negative Cold agglutinins were negative A blood specimen for the psittacosis complement fixation test was sent to Dr Karl F Meyer of the Hooper Foundation, San Francisco, but the report was not available antemortem

X-rays—On admission there was "diffuse engorgement of the lower halves of both lungs which may be pneumonic in character Small effusions at both bases Heart enlarged in the transverse diameter Slight bulge at the base of the aorta" On the third hospital day a chest x-ray revealed "heart moderately enlarged Marked widening of the entire arch of the aorta Extensive chronic passive congestion involving both lungs with some tendency to fibrosis and confluence of the lesions in the lower half of both hemithoracies"

Course—The patient was given 100,000 units of penicillin every three hours In addition, he was given oxygen and infusions of glucose in saline His temperature which, shortly after admission, had risen to 106 4 F dropped progressively to 101 4 F at the end of twenty-four hours The white blood count on the second hospital day was 17,000 with a marked shift to the left The lungs showed numerous moist rales at both bases On the morning of the third day the temperature rose to 103 4 F and fluctuated from 101 to 104 0 F throughout the fourth and fifth hospital days On the fifth hospital day the patient still appeared acutely ill The white blood count was now 11,100 with marked shift to the left It was advised that sulfadiazine therapy be given in addition to penicillin, and he received an initial dose of 4 0 Gm with 1 Gm every four hours thereafter Throat culture on the sixth hospital day showed Streptococcus viridans and Staphylococcus aureus A sulfadiazine level at this time was 5 3 mg per 100 cc On the sixth hospital day the temperature began falling and went from 102 6 down to 100 4 F The patient appeared subjectively improved The chest showed findings of consolidation at both lower lobes with bronchial breath sounds and sibilant and subcrepitant rales over the right upper chest anteriorly and posteriorly On the seventh hospital day the temperature continued its downward trend going to 99 0 F , rising once again to 100 4 F and then going down to range between 97 4 and 99 0 F The patient raised a scant amount of sputum for the first time on the seventh day, and this revealed a pneumococcus which did not type, Staphylococcus aureus, and Streptococcus viridans On the eighth hospital day there were diffuse signs over both lung fields The patient continued to require an oxygen tent A sulfadiazine level on this day was 6 1 mg per 100 cc The patient had a fairly good day, and the temperature ranged from 99 0 to 100 0 F Toward evening he tapped on the oxygen tent to warn the nurse of sudden distress and, when seen, was found to be unconscious, breathing deeply and slowly by gasps He was cold and clammy There were no audible heart sounds, and the peripheral veins were markedly distended Caffeine was administered without effect, and the patient expired

Discussion

DR. EMANUEL APPELBAUM These two cases are similar in certain respects and can be discussed together Important differences between them will be brought out later in the discussion It is clear from the presentation that pneumonia was the dominant disease in both cases The important questions are, "What was the type of pneumonia?" and "What was the final cause of death?" in each patient

Since primary atypical and virus pneumonia are prominent possibilities, it seems worthwhile to preface the analysis of our cases with a brief discussion of the salient features of these pneumonias During the past few years, primary

atypical pneumonia has come into prominence because of its increased incidence Clinical similarity of this disease to the proved virus pneumonias, particularly psittacosis, and its resistance to sulfonamides have greatly contributed to the concept that it is due to a virus infection Indeed, it is commonly referred to as "virus" or "viral' pneumonia However, pneumonias of nonviral origin such as coccidioidomycosis toxoplasmosis, Q fever, and that due to certain bacteria, notably P tularense can give a very similar picture. Even cases of proved pneumococcic pneumonia may on occasion resemble primary atypical pneumonia It is also necessary to mention the recent studies on the isolation of an indifferent streptococcus from a number of cases of primary atypical pneumonia. It appears, therefore, that primary atypical pneumonia is a clinical entity with multiple causes and that the term "virus" pneumonia is not appropriate for this disease

The clinical and pathologic aspects of primary atypical and of proved virus pneumonias are very similar The disease is ushered in by headache, chilliness or frank chills, fever cough, and muscular aches in the chest and abdomen The cough is usually dry at the onset but may become productive later in the disease The respiratory rate as a rule, is only slightly increased, although there may be a marked degree of dyspnea associated with cyanosis. A relative bradycardia is common during the first week. In general, the physical signs in the chest are surprisingly few while the roentgenograms will show considerable changes in the lungs The pneumonia is characteristically a patchy, migrating pneumonitis, varying in density from mottling to frank lobar consolidation There is little tendency to involve the pleura

The initial white blood count is normal or low with 65 to 90 per cent segmented neutrophils However, a slight leukocytosis may occur, especially during convalescence. There is often a moderate albuminuria. At necropsy, the lungs show a diffuse confluent bronchopneumonia, together with areas of hemorrhage, necrosis, and vascular thrombosis. The alveolar exudate is composed largely of fibrin, red cells, and macrophagic monocytes The alveoli in addition, may have a hyalin-like lining.

There is considerable difference of opinion as to the value of the cold agglutinin test in the differential diagnosis of primary atypical pneumonia It seems that cold agglutinins appear in about 50 per cent of cases of primary atypical pneumonia. Titers of 1 64 or more are significant and constitute strong evidence for this disease. Even more important is the demonstration of a rise and fall in the titer of cold agglutinins during the patient's illness As a rule, the agglutinins appear early in the second week of the illness, rise progressively and attain the highest titer in the third week, and fall appreciably during the fourth week. There is some evidence that the height of the titer bears a relationship to the severity of the illness. High titers of cold agglutinins are uncommon except in primary atypical pneumonia, rubella, infectious mononucleosis, and in chronic diseases associated with splenomegaly

For the definite diagnosis of a virus pneumonia it is necessary either to isolate the virus from the patient's blood or sputum, or to demonstrate in the patient s serum the presence of specific antibodies in significant titers. This can be illustrated with psittacosis or ornithosis, a disease of specific virus etiology The most striking feature of this disease is the early development of pneumonia During the early phase of the disease it is at times possible to make a definite diagnosis by isolating the virus from the patient s blood or sputum. More commonly, the diagnosis is established by obtaining a positive complement fixation test. Of particular significance is the demonstration of a two- to fourfold increase in the titer of complement fixing antibodies. However *it is important to point out in connection with* the complement fixation test that there are cross reactions between psittacosis virus the Eaton virus, meningopneumonitis virus, and the virus of lymphogranuloma venereum.

In this connection it is important to note that the host range of psittacosis is now known to be much more extensive than was previously thought. Contact with birds of the parrot or pigeon family is no longer essential to suspicion of the disease Bird droppings contain the virus in large amounts and may be responsible for respiratory invasion in man There is also evidence that a patient with psittacosis can initiate human to human transfer

With these preliminary remarks let us examine our cases. In the first case there was an extensive pneumonitis of a severe form In addition the patient had advanced arteriosclerotic heart disease associated with coronary artery closure and congestive heart failure The clinical course was short and the terminal picture was a combination of circulatory and pulmonary insufficiency and severe toxemia. It may be noted that the nasopharyngeal cultures yielded a mixture of organisms, which are normal harbingers of that cavity

In regard to the type of pneumonia, the diagnosis would seem to rest between primary atypical and bacterial pneumonia. I am inclined to *lean toward the bacterial type. This gains par*ticular support from the blood counts which showed aleukocytosis with a high percentage of

stab forms However, primary atypical pneumonia complicated by secondary bacterial infections can produce this type of blood picture It is quite possible that one or more of the organisms recovered from the nasopharyngeal culture served as the causative agent

There is also a possibility that the pneumonia in this case is superimposed on pulmonary infarctions Small infarcts may occur in congested lungs as a result of local vascular thrombosis, or they may be of the embolic type, originating in mural thrombosis in the right side of the heart or in phlebothrombosis in the peripheral veins The last-mentioned source is the most common one even in cardiacs It is well known that pulmonary infarcts are frequently complicated by a secondary pneumonitis due to the descent of organisms from the upper respiratory tract The bacterial flora is mixed and may include anaerobic micro-organisms In some instances, the pneumonia may advance to suppuration and even abscess formation In this connection, it is well to remember that pulmonary edema per se can simulate pneumonia and be the cause of fever and leukocytosis

The patient's failure to respond to chemotherapy can be attributed to the severity of the infection and to certain unfavorable contributory factors, particularly the advanced age of the patient and the presence of severe congestive heart failure

In the second case there was a confluent bronchopneumonia with some pleural involvement The features in this case that need to be emphasized are the recurring chills, the slight cough, the temperature-pulse dissociation, the normal or slightly elevated leukocyte counts, and the temporary clinical improvement followed by a rather sudden death The throat and sputum cultures revealed a mixture of gram-positive cocci There was also evidence of the presence of arteriosclerotic heart disease without apparent congestive heart failure

It is clear from a review of the salient features of this case that both primary atypical and definite virus pneumonia are prominent possibilities It may be noted that the patient's serum was negative for cold agglutinins However, a negative test during the first week is of no value in the diagnosis of primary atypical pneumonia The possibility of this case being a true virus pneumonia, such as psittacosis, has an even greater appeal This thought led us to submit the specimen of blood to Dr Meyer for the psittacosis complement fixation test

The sudden death of the patient following a short period of improvement suggested the occurrence of either pulmonary embolism or of a cardiac complication, such as coronary artery closure or cardiac standstill The description of the terminal picture is in favor of a cardiac death

Dr Morris Pearlmutter These cases appear to have an important feature in common, namely, the occurrence of a shock syndrome due to overwhelming infection The fact that severe infection may produce shock should always be uppermost in our minds, particularly from the standpoint of therapy The investigations into this field by Ebert and Stead clearly indicate that measures to increase the circulating blood volume with blood and plasma transfusions are without effect Unless the infection is effectively brought under control at the earliest possible moment, these patients will die The importance of early recognition of the shock as being due to infection is, therefore, obvious [1]

Report of Complement Fixation Test for Psittacosis —Dr Meyer's report, received postmortem, revealed the patient's serum to fix complement in the presence of psittacosis antigen in serum dilution 1 2 (4 plus), 1 4 (4 plus), 1 8 (4 plus), 1 16 (4 plus), and 1 32 (4 plus)

Pathology

Dr Henry Spitz In Case 1, anatomic diagnosis gave the following information severe, generalized arteriosclerosis, hypertrophy and dilatation of heart, sclerosis of coronary arteries, severe, with calcification, fibrosis of myocardium, infarct of myocardium, healed, apex and apical portion of interventricular septum, chronic passive congestion of viscera, lobar pneumonia, resolving, right lower lobe, acute splenic tumor, and fatty degeneration of renal tubules

Autopsy disclosed the following

The heart was enlarged in all diameters and weighed 660 Gm The right auricle, ventricle, and the corresponding valves appeared unaltered The wall of the right ventricle was thickened, measuring 1 to 10 mm The left auricle and ventricle were moderately dilated, mitral and aortic valves presented scattered fibrous nodules at the base and free border The myocardium of the left ventricle was firm, red with fine streaks of gray, and measured 25 to 30 mm in thickness At the apex and the adjacent portion of the interventricular septum it was thin and replaced by fibrous tissue, and the lumen of the ventricle bulged into the interventricular septum The coronary arteries were stiff and markedly narrowed by atherosclerotic plaques at the ostia and at many points along their course without complete occlusion of the lumina All major arteries were the seat of numerous atherosclerotic plaques with calcification and occasional ulceration The liver was large, weighed 1,800 Gm , and showed evidence of severe chronic passive congestion, the other viscera showed similar changes of a lesser degree There was no edema or no free fluid in any of the body cavities

The lungs showed moderate diffuse congestion

The left lung weighed 575 Gm The right lung weighed 950 Gm. The right lower lobe was firm, rubbery, and airless The cut surface was dark red, mottled with gray, and had a peculiar ground-glass appearance. Postmortem culture from this lobe showed only contaminants The tracheobronchial lymph nodes were enlarged, soft, and moist The kidneys were large, having a combined weight of 580 Gm. The parenchyma was reddish brown, the corticomedullary markings were distinct The increased weight was due in part to the presence of many cortical cysts the largest of which measured 3 cm in diameter and occupied the entire thickness of the parenchyma The other organs showed no relevant gross changes.

Microscopic examination of the lung showed marked diffuse congestion. The alveoli of the right lower lobe were filled by masses of large mononuclear cells Few polymorphonuclear leukocytes and little fibrin was present. The picture was that of a resolving pneumonia

In the kidneys considerable degenerative changes were found in the tubules The epithelium was swollen, granular, contained sudanophilic vacuoles, and was often desquamated

Sections from other organs yielded no additional pertinent information

In summary, this was a patient with severe arteriosclerotic heart disease and an old myocardial infarct who apparently developed coronary insufficiency in the resolving stage of a lobar pneumonia. The associated renal lesion is not uncommon in cases of severe pneumonia

For Case 2 the anatomic diagnosis was as follows confluent lobular pneumonia, both lower lobes resolving acute fibrinous pleuritis with effusion, acute fibrinous pericarditis acute lymphadenitis of bronchotracheal lymph nodes, acute splenic tumor, hypertrophy and dilatation of heart, edema of lungs, acute passive congestion of liver, and congenital anomaly of heart bicuspid aortic valve and separate origin of the circumflex and descending branches of the left coronary artery

Autopsy of Case 2 showed a slender, well-developed body There was no peripheral edema The following pertinent findings were noted each pleural cavity contained 2 000 cc. of yellow, clear, stringy fibrinous exudate covering the pleural surfaces. Similar exudate was found attached to the thoracic cage by dense fibrous adhesions The apex of the right upper lobe was occupied by a dense retracted fibrous car Each lung weighed 1,100 Gm Both upper and the right middle lobes were boggy, and abundant frothy fluid exuded from the cut surfaces. Both lower lobes were firm, fleshy, and dark red. The bronchopulmonary and tracheobronchial lymph nodes were enlarged, soft, moist, and reddish-gray streaked with black.

The heart was enlarged, weighed 500 Gm , and showed a thickened left ventricle The coronary arteries showed mild atherosclerotic changes The aortic valve was bicuspid each cusp being of equal size The cusps were slightly fused and quite rigid due to nodular deposition of calcium No horizontal or vertical bar could be identified in either cusp Three coronary arteries took their origin from the anterior cusp One was the right coronary artery and the other two, arising closely together in the opposite angle of the sinus of Valsalva, were the left circumflex and the left anterior descending branch, respectively The aorta and large blood vessels showed only slight atherosclerotic changes. The liver was large, weighed 1 780 Gm. and appeared congested

The gallbladder was small and thick walled and contained about fifteen faceted calculi The spleen was enlarged and congested The kidneys were large, their surface was finely granular, and a few larger deep scars were noted The cut surface showed no notable changes. The other organs showed no important abnormalities.

Microscopic examination of the lungs (lower lobes) showed marked congestion of the alveolar walls. The alveoli contained numerous large mononuclear phagocytes and clumped fibrin. Few polymorphonuclear leukocytes were present No hyaline membranes and no notable interstitial reaction were observed The remainder of the lung showed edema. Section from other organs yielded no significant additional information.

The lesions in the lung were not characteristic or suggestive of "atypical" or virus pneumonia. It is, therefore, difficult to classify this case as virus pneumonia on anatomic grounds The positive complement fixation test is no absolute evidence for the identification of the pulmonary lesion observed at autopsy since a rather high antibody titer may be present weeks and months after the clinical disease has subsided

The terminal episode suggested rapid cardiac failure with edema of the lungs and acute passive congestion of the liver The pleural effusion was in part inflammatory and in part probably the result of passive congestion

The anomaly of the aortic cusp was interpreted as congenital, since both cusps were of equal size and no remnant of fusion could be detected The stenosis of the aortic ostium might have been responsible for the hypertrophy of the myocardium but essential hypertension cannot be excluded since the aortic stenosis was very mild

Reference

1 Ebert, R. V., and Stead E. A. Jr J Clin. Investigation 20: 671 (1941)

NECROLOGY

Reuben Cronson, M D, retired, formerly of New Rochelle, died on July 6 at the age of eighty-nine Dr Cronson was graduated from the College of Physicians and Surgeons, Columbia University, in 1888 and later studied at the University of Vienna He was a founder of Philanthropin Hospital, New York City, organized in 1905, which was later renamed Jewish Memorial Hospital Dr Cronson was a former president of the medical board of the latter hospital He had also been visiting gynecologist at Philanthropin Hospital and had worked in the Cancer Research Clinic, New York City In 1947 he received a certificate from the Medical Society of the State of New York in recognition of his fifty years of medical practice He was a member of the American Medical Association and the New York State and Westchester County Medical Societies

Charles Wilmer Fitch, M D, died on July 1 at his home in the Bronx His age was seventy-four He was graduated from the College of Physicians and Surgeons, Columbia University, in 1899 and had practiced medicine in New York City for forty-five years Dr Fitch was a member of the American Medical Association and the New York State and Bronx County Medical Societies

Alice M Flood, M D, sixty, of New York City, died on June 1 A graduate of the University of Michigan Medical School in 1909, Dr Flood was a member of the American Medical Association and the New York State and County Medical Societies

Onslow Allen Gordon, M D, sixty-one, died on June 8 at his home in Brooklyn Dr Gordon was graduated from Long Island College Hospital in 1911 A captain in the Army Medical Corps during World War I, he had formerly served as associate professor of gynecology and clinical professor of obstetrics at New York University College of Medicine and also as attending physician on the staff of Greenpoint Hospital, Brooklyn, and associate surgeon at St Mary's Hospital, Brooklyn Dr Gordon had been director of the Department of Obstetrics and Gynecology, Carson C Peck Memorial Hospital, Brooklyn, since 1930 He was also an associate gynecologist at Bellevue Hospital

A fellow of the American College of Surgeons and of the New York Obstetrical Society and former president of the latter, Dr Gordon was a member of the American Medical Association, the Brooklyn Gynecological Society, and the New York State and Kings County Medical Societies

Anatole Kolodny, M D, New York City, died on July 8 at the age of fifty-five Dr Kolodny was a graduate of the Imperial University of Kazan in 1917 He served as regimental chief surgeon of the Imperial Russian Army until the Bolshevik Revolution He went to Germany in 1919 and served as an assistant in pathology at Berlin Pathological Institute until 1922 ,when he came to the United States He was an instructor in the medical schools of the University of Illinois and the University of Iowa

He came to New York in 1934 and at the time of his death was a neurosurgeon on the staff of Beth-El Hospital and the Brooklyn Hebrew Home and Hospital for the Aged Dr Kolodny was a fellow of the American College of Surgeons and a member of the American Medical Association, the American Association of Pathologists, the American Association for the Surgery of Trauma, the American Association for the Advancement of Science, and the New York State and County Medical Societies

Charles F Prairie, M D, of Massena, died on June 30 at the age of sixty-four Dr Prairie was graduated from Syracuse University College of Medicine, in 1906 He served as attending physician on the staff of Massena Memorial Hospital, Massena

Dr Prairie, a former president of the St Lawrence County Medical Society, was a member of the American Medical Association and the New York State and St Lawrence County Medical Societies

Franklin Raphael Strong, M D, of Brewerton, died on June 20 He was seventy-one years old A physician in Brewerton since 1905, Dr Strong was graduated from Syracuse University, College of Medicine, in 1904 He was a member of the American Medical Association and the New York State and Onondaga County Medical Societies

Joseph Zicarelli, M.D, of New York City, died on June 28 at the age of sixty-four Dr Zicarelli was graduated from the Long Island College Hospital in 1909 and had practiced medicine in New York City ever since He was a visiting physician at St Vincent's Hospital, New York Eye, Ear, and Throat Infirmary, and New York Post-Graduate Hospital

Dr Zicarelli was a member of the American Medical Association and the New York State and County Medical Societies

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THE GENERAL PRACTITIONER'S OBLIGATION TO HIS PATIENTS

A man should be a thoroughly good doctor, whatever group he belongs to A man belonging to the general practice group should take particular pains to see that he is as nearly correct in his answers as possible He should not excuse himself by saying, "I am only doing general practice" It is much better when in doubt to call for consultation than to jeopardize the patient and one's own status by giving questionable treatment

The minimum duty of a general practitioner is to attend faithfully his hospital staff meetings He is sure to learn something scientific each time, and, further, it brings him in contact with his fellow staff members —*California Medicine, April, 1948*

HOSPITAL NEWS

MacCurdy Reports Increase In State Hospital Population

THE upward trend in the population of the 27 mental institutions under the jurisdiction of the Department of Mental Hygiene has accelerated during the past year, Dr Frederick MacCurdy, Commissioner of Mental Hygiene, has revealed. A preliminary survey of the figures reported as of March 31, 1948, by the department s 20 mental hospitals, six State schools for mental defectives, and Craig Colony for epileptics indicated that the population of these institutions has increased by 3 240 over the corresponding total at the close of the previous fiscal year

At the close of the fiscal year (March 31) the department's institutions were caring for a total of 103,448 patients, of these, 90,266 were in the institutions 1 810 in family care, and 10 372 were in convalescent care, said Dr MacCurdy The patient population in the institutions increased by 2 786 during the year, while those in convalescent care increased by 346 There was an increase of 108 among those in family care.

One hundred years ago there was only one State hospital, the New York State Lunatic Asylum at Utica in 1848 this institution was caring for 495 patients At that time an additional 1 215 patients were being cared for in various county asylums and poorhouses throughout the State, making a total of 1,710 mental patients who were being provided for in public institutions of the State. Sixty years ago there were seven State hospitals which in 1888 had a resident population of 5 171 patients, these, together with 9,106 patients in various county asylums, made a total of 14,277 patients being cared for in public institutions of the State. Twenty five years ago there were 13 civil State hospitals with a resident population in 1923 of 41 302 patients.

At the close of the fiscal year 1948 the State hospitals were caring for 87,468 patients an increase of 2,947 during the year Dr MacCurdy pointed out that this increase, almost twice the corresponding increase for the previous year, indicates an acceleration in rate toward the level existing prior to the war

Of the 87,468 mentally ill patients, 77 675 were residing in the hospitals 1,119 in family care, and 8 674 were in convalescent care Compared with figures for the previous fiscal year these represent increases of 2 472, 60, and 406, respectively The growth in family care is slow owing to difficulties in finding suitable family care homes

Public Opinion Survey Used to Guide Sidney Hospital s Board

A SURVEY of public opinion on The Hospital, Sidney, was conducted in June by a community relations committee appointed by The Hospital's board of managers Questionnaires to determine how familiar the public is with The Hospital and what it thinks should be done to meet increasing demands for care were mailed to several thousand citizens of Bainbridge Guilford Masonville, Unadilla, Sidney and other communities in The Hospital s service area.

In a foreword to the questionnaire Dr Joshua E Sweet, president of the board of managers wrote

"During the four complete years of The Hospital s existence, 4,225 patients have been admitted, 1,003 babies have been born and 2,644 major and minor operations have been performed The rapidly increasing need for its services is evidenced by the rise of 72 per cent in the number of admissions and of more than one hundred per cent in the number of operations over this period

'Today virtually every bed in The Hospital is filled throughout the year and at times it is caring for as many as 45 patients in space designed for 30 The board of managers is faced with the immediate problem of meeting this urgent demand for greater facilities.

Although The Hospital is owned and operated by the Town of Sidney more than half its patients come from other towns, principally Bainbridge Guilford Masonville and Unadilla.

Report Says Full Psychiatric Facilities Now Available at Mount Sinai

THE Mount Sinai Hospital New York City released its fifty ninth annual report in July reporting that the institution during 1947 had cared for a record number of patients, had expanded its education and research projects, and had established a tumor clinic.

The hospital also attained a long-sought objective of affording full facilities for psychiatric treatment in all phases of patient care. The services are handled by 60 specialists The hospital s psychiatric division comprises an adult outpatient clinic, a child-guidance clinic a 22-bed inpatient ward and a comprehensive liaison network between the psychiatric structure and the institution s traditional services

According to George B Bernheim president emeritus of the hospital 16,838 inpatients were cared for a rise of 1,319 over 1946, and there was an increase of 10 000 outpatient visits Mount Sinai also continued to expand its medical house staff

NEWS NOTES

Dr Edwin G Zabriski, acting director of the Neurological Institute at Columbia-Presbyterian Medical Center, New York City, speaking at a dinner marking the closing of the Veterans Rehabilitation Clinic at the medical center in July, advocated the establishment of night psychiatric clinics for low and moderate income groups The veterans clinic was closed, he said, because acute types of war-engendered neuroses were no longer encountered

Comforts of home life will be among the things emphasized in Wing R, the new addition to Strong Memorial Hospital, Rochester, Dr John Romano, professor of psychiatry at the University of Rochester and psychiatrist-in-chief at the hospital, told the Rochester Rotary Club at a meeting June 23 None of the necessary appointments of a modern hospital will be omitted, he declared Although the work in the building will be integrated with that of the medical and surgical work of the hospital, it will deal chiefly with the emotionally sick and will be largely preventive in nature

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New plans for the proposed Massena Memorial Hospital call for 27 private rooms, five four-bed wards, five three-bed wards, and 14 beds for children

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The new six-story wing of the Sisters Hospital, Buffalo, which the Sisters of Charity plan to open in September as part of the centenary of their work in Buffalo, is about completed, according to an announcement from the hospital. The one-story portion of the building will house an outpatient clinic, and the rest will provide quarters for interns, operating rooms, and laboratories for medical research and diagnosis

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Cornwall Hospital was presented with a new, modern ambulance on June 11 as a result of a special campaign of the hospital staff and the community Dr T D McMenamin, chief of the medical staff, made the presentation speech, paying special tribute to the late Dr R. W Thompson for his efforts as chairman of the ambulance campaign

Plans for the expansion of Lourdes Hospital, Binghamton, will make the hospital capable of caring for 140 children and adults and 36 newborn infants, doubling the present capacity Four new operating rooms, modernized and enlarged delivery rooms, demonstration and classrooms for student nurses, and new facilities for the pediatrics, x-ray, emergency, and laboratory departments are also planned

Hospital administrators and medical men will be particularly interested in "The Case of Mrs Conrad," a new March of Time film now being shown to the general public in theaters throughout the nation The film tells the story of an operation from the moment the family doctor suggests hospitalization until the patient, fully recovered, returns to her home It touches on the details of hospital procedure, the work of the medical personnel who aid in the operation, and the provision of hospitalization benefits, such as those provided by Associated Hospital Service—New York's Blue Cross Plan

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According to the 139th annual report of the French Benevolent Society of New York and the French Hospital, New York City, inpatients treated at the hospital last year totaled 7,944, as against 8,640 the year before The outpatient department reported 51,228 visits in 1947, against 53,724 in 1946

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Eighty-three per cent of this year's graduating class of the New York University College of Medicine will serve internships in hospitals of Greater New York, Dean Currier McEwen announced at Last Day Exercises of the College in June

"You are now assuming, along with thousands of your fellow alumni, the responsibility for the medical care of a large part of this community," Dr McEwen told the graduates "Over the years it has become established that one in every six doctors practicing in Greater New York received his training at New York University College of Medicine, a record of service that is unique among medical schools of this area." Of the 132 graduates, 109 will serve internships in Greater New York hospitals, and 61 per cent of this 109 will serve in the public hospitals of New York City, he said

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The Halloran Veterans Administration Hospital in Staten Island is to be enlarged in bed capacity by one third, David P Page, deputy V A administrator, announced The program will increase the number of beds from 1,125 to 1,500 by January 1, Mr Page said

Dr Harold H Berman, assistant director of St Lawrence State Hospital, Ogdensburg, and Dr William R. Carson of the Potsdam Hospital staff are conducting a course in abnormal psychology for teachers during the summer session at Potsdam State Teachers' College The major emphasis of the course is on behavior disorders of children with special attention to school problems, illustrated by actual case studies, and the basis of psychiatric advice in these cases with emphasis on the role of the teacher in both recognition and follow-up of serious problems The course includes an historical survey of the humane, legal, and scientific aspects of and a brief résumé of major schools of psychopathology Demonstrations of clinical examples of major mental disorders are held at St Lawrence State Hospital

PERSONALITIES

Elected

Dr Emil Goetsch, retiring as director of the surgery department at Long Island College Hospital, Brooklyn, after 20 years of service, as a member of the board of regents of the hospital. As president of the staff of Good Samaritan Hospital Suffern, Dr Emanuel Freund, Haverstraw

Appointed

Dr Rulon W Rawson former associate physician at Massachusetts General Hospital, Boston, and assistant professor of medicine at Harvard University, as chief of the division of clinical investigation at Memorial Hospital Center for Cancer and Allied Diseases, New York City, and associate professor of medicine, Cornell University Medical College.

Dr Freddie Homburger associate of Sloan Kettering Institute and former head of clinical investigation at Memorial Hospital New York City, as research professor of medicine and chief of the new cancer control and research unit at Tufts College, Boston.

Former chief of division of neuropsychiatry at Montefiore Hospital New York City Dr H Houston Merritt as director of neurological service, at Presbyterian Hospital s Neurological Institute and professor of neurology at Columbia University, College of Physicians and Surgeons.

Dr Hans Kraus, as assistant professor of clinical rehabilitation New York University College of Medicine, and director of muscle re-education and therapeutic exercise at the Institute of Rehabilitation and Physical Medicine, New York University—Bellevue Medical Center

To the house staff at Albany Hospital, Dr Dogan Parese of Kirkaneli, Turkey, as intern in surgery and Dr Hector A. Quesada, Havana, Cuba, as assistant resident in anesthesia.

Six resident physicians to hospital staff of Ellis Hospital, Schenectady Dr Alfred Walter Lucas, Hornell, Dr Jason LaRue Wiley, Jr , Auburn, and Dr Glen E Cooley, Schenectady, surgery, Dr John Daniel Diono, Waterbury, Connecticut, and Dr George E York Schenectady medicine, Dr Edward B McCabe, Rensselaer, radiology, Dr Robert A. Berault, Schenectady, and Dr Charles Poskanzer, Albany, pathology, Dr Craig Lyon Benjamin, Schenectady obstetrics and gynecology and Dr David Glenn McFadden Thorndale, Canada, orthopedic surgery

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NEW DRUG POSSIBLE TB REMEDY

Trial of a new drug as a possible remedy for tuberculosis is getting under way, Dr Alfred Burger of the University of Virginia announced at the first national medicinal chemistry symposium sponsored by the American Chemical Society in Ann Arbor Michigan.

The drug is a Japanese cousin of quinine called cepharanthine Several drugs derived from quinine have been studied for possible use in tuberculosis but only cepharanthine has shown any promise Dr Burger said.

It was first isolated in Japan shortly before the war It is now available in this country, but since the studies have 'barely started' no conclusions about its effectiveness can be drawn as yet.—*Science News Letter June 26 1948*

VICTORY OVER CANCER REPORTED NEARER

Victory over cancer seems nearer in view of advances reported by Atomic Energy Commissioner Lewis L. Strauss to a Senate appropriations subcommittee

Cancer patients, however should be warned not to expect immediate benefits from these advances They are important steps along the road to victory but there are still many obstacles to overcome

One advance involves the injection of radioactive colloidal gold, from the atomic pile at Oak Ridge directly into cancers. This brings cancer-destroying beta rays from millions of point sources, instead of from six or eight into play on the cancer It means increased cancer destruction with less damage to surrounding healthy tissue. Dr Paul F Hahn of Vanderbilt University, Nashville who developed this method of cancer treatment, is as enthusiastic as any true scientist allows himself to be in the first stages of a new development. But he does not say he has a cancer 'cure More time must elapse before that can be determined

Still far from application in cancer treatment but impressive in its possibilities is the second advance reported by Commissioner Strauss. This consists in successfully getting a cancer-destroying radioactive chemical to go directly to the part of the body desired, without any dangerous stops in healthy tissue The success has been achieved in the case of one organ the kidney and so far applies only to rats, mice and rabbits. The chemical used is radioactive iodine. It is done by a kind of vaccination procedure. Advantage is taken of the fact that an animal will make antibodies to tissues of another species of animal when these get into the first animal s body The antibodies are specific. If they are for example, antirat kidney they will go straight to the rat s kidney when injected into a rat. When mixed with radioactive iodine they take this chemical along with them. The hope now is that the technic can be applied to directing radioactive chemicals to cancers in the human body The work leading to this advance was done by Drs. David Pressman and Geoffrey Keighley of California Institute of Technology now at Memorial Hospital s Sloan Kettering Institute in New York.—*Science News Letter June 26 1948*

MEDICAL NEWS

Postgraduate Courses for Naval Reserve Officers

UNDER the auspices of the Commandant, two postgraduate courses (one in medicine and one in surgery) will be offered at the U S Naval Hospital, St Albans, Long Island, during the month of October, 1948

These courses are intended to engender furtherance of interest in the Naval Reserve preparedness plan, and will feature as many medicomilitary subjects as possible in the allotted time Lecturers will be drawn from the Hospital's consultant and staff physicians, Army and Navy Medical Departments, Public Health Service, and outstanding civilian physicians

Participation of Naval Reservists will be u two classifications (1) Naval Reserve off (organized and/or volunteer) who request 14 d training duty with pay and allowance, and Naval Reserve officers who volunteer to give on two lectures, demonstrations, etc They receive appropriate-duty pay

Prior to arranging these postgraduate cou inquiries are requested from Naval Reserve offi who tentatively intend taking them These quiries may be addressed to Captain M Bro Federal Office Building, 90 Church Street, York 7, New York

New York University Inaugurates Series of Health Education Institutes

ANNOUNCEMENT has been made of the inauguration of a series of annual Health Education Institutes under the sponsorship of the School of Education, New York University The first of these Institutes to be held this summer from August 16 to September 3, 1948, under the Department of Physical Education and Health, School of Education, in cooperation with American Association for the Advancement of Science, the Research Council on Problems of Alcohol, and other national agencies, will be devoted to problems in alcohol education

The Alcohol Education Institute at New York University will be staffed by outstanding scientific authorities throughout the country, in addition to national leaders in education on the University faculty

These lecturers will include, among others, the following Dr Ralph S Banay, research ass ate, Department of Neurology, Columbia Uni sity, Dr I Jay Brightman, assistant direc Division of Medical Services, New York S Department of Health, Brigadier General Che R Brown of the Salvation Army, Dr Anto Carlson, professor emeritus of physiology, Uni sity of Chicago, Senator James E Gardner of state of Virginia, Dr H B Haag, professo pharmacology, dean of the Medical School of Medical College of Virginia, Mr Joseph Hi acting director, Research Council on Problems Alcohol, New York, Edward J McGoldrich, director, City of New York Bureau of Alcoh Therapy, Dr Mary Jane Sherfey, instructor psychiatry, Cornell University Medical Coll and Rev Alson J Smith, Roxbury Metho Church, Stamford, Connecticut

Cornell University Medical College Offers Graduate Instruction in Internal Medicin

CORNELL University Medical College is now offering graduate instruction in internal medicine and neurology The teaching facilities of the Second (Cornell) Medical Division, Bellevue Hospital, New York City, comprising 145 beds, are devoted exclusively to this work. The instructors are members of the faculty of Cornell University Medical College

The course is designed to give practical instruction in the subjects of internal medicine, neurology, and pathologic physiology The work consists of daily bedside study of patients on the medical and neurologic wards Each physician is assigned a series of patients and cooperates with the resident and attending staff in their care A limited number of men may obtain special training in cardiology, hematology, diabetes, endocrinology and gastrointestinal diseases in the special clinics of the Outpatient Department All students receive practical instruction in electrocardiography

The bedside teaching is supplemented by conferences each week to cover morbid anatomy, clinical medicine, gastroenterology, pulmonary disease, and the surgical aspects of medical problems

The teaching program is a continuous one physicians are admitted on the first of each mo as vacancies occur For any one individual, course is of either three months' or six mont duration The three months' course may incl six weeks of neurology and six weeks of medicine may be limited entirely to medicine The maxim number of physicians registered in the course at one time will be limited to 25

An examination is offered by the Department Medicine, Cornell University Medical College, the end of the course Successful completion of t examination and satisfactory ratings by individ tutors will be required of those who desire credit partial fulfillment of the requirements of American Board of Internal Medicine

For admission, each applicant is required submit a transcript of medical school record a information about hospital training and milit service

Inquiries and applications should be addressed Dr John E Deitrick, director, Second (Corne Medical Division, Bellevue Hospital, First Aven and Twenty-sixth Street, New York 16, New Yor

Cutter Laboratories Resumes Shipments

ANNOUNCEMENT that Cutter Laboratories, Berkeley, California, is ready to resume shipment of Cutter solutions from its Berkeley and branch warehouses was made Monday June 21 by Fred A Cutter, vice-president of the organization.

The full text of Mr Cutter's statement is as follows

We are now ready to resume shipment of Cutter solutions from our Berkeley and branch warehouses.

We wish we could tell you that the cause of the contamination is now definitely known. We cannot truthfully do so In the six weeks since we recalled our solutions, hundreds of thousands of flasks have been critically examined. Every piece of equipment and every instrument was meticulously checked. There was no evidence of equipment or instrument failure, and we could not definitely confirm closure failure or any other cause.

We can assure you, however, that not a single bottle which was clear on visual inspection has been found to be contaminated and that we will continue to do everthing in our power to assure the safety that has been the cornerstone of our existence and growth for over fifty years.

Conference of State Health Officers and Public Health Nurses Held

THE 44th annual conference of New York State health officers and public health nurses was held at Saratoga Springs from July 21 to 23 with a program planned to place emphasis on four general fields of public health interest tuberculosis control nutrition in public health, development of county health departments and health officers.

At the opening session with Dr Herman E. Hilleboe, State commissioner of health presiding, addresses were given by Dr Leonard Scheele, surgeon general of the U.S Public Health Service, and Dr Leo F Simpson, president of the Medical Society of the State of New York. Dr Austin M Brues, director of the biology division Argonne National Laboratory Chicago, also spoke on The Public Health Aspects of Total Body Irradiation.

Presiding officers speakers and topics discussed in the four sessions included

Tuberculosis—Dr William A Brumfield, deputy commissioner of health, presiding Mr William Steenken Jr, head of Trudeau Laboratory Trudeau, "The Role of the Laboratory in Tuberculosis Research Dr William Roommich, Minneapolis, Minnesota 'Analysis of Follow up in a City wide Chest X ray Survey, and Dr Walsh McDermott, New York Hospital, New York City, "Streptomycin—Its Present Status in Tuberculosis Treatment.

Nutrition—Dr Hilleboe presiding Dr Frederick J Stare department of nutrition, Harvard University School of Public Health Boston, 'Education in Nutrition for Public Health Personnel , Professor Leonard A. Maynard, director School of Nutrition Cornell University, Ithaca, 'Present Nutrition Research Trends and Their Application to Public Health, and Dr W H. Sebrell chief, Division of Physiology, U S Public Health Service, Washington, D C United States Public Health Service Program in Nutrition

County health departments—Dr Brumfield presiding Dr Harry S. Mustard commissioner of health, New York City Department of Health, County Health Departments—Past, Present, and Future', Dr Vlado A. Getting commissioner of public health Massachusetts Department of Public Health Boston "Functions of a County Health Department, and Dr Ernest L. Stebbins, professor of public health administration, School of Hygiene and Public Health, Johns Hopkins University Baltimore, Maryland, "What the County Health Department Does for the Community"

Health officers—Dr George E. Sanders, president, New York State Health Officers' Association presiding Dr Berwyn F Mattison, health commissioner Erie County Health Department, Buffalo Problems of Organizing a New County Health Department Dr C A Sargent, health commissioner Syracuse City Health Department, 'The Integration of School Health Services in the County Health Department Program', Dr Chester A Hicks, director of public health New Rochelle City Health Department, 'The Building of a City Health Department with the Help of State Aid Legislation, and Dr William A. Holla, health commissioner Westchester County Health Department, "Mental Hygiene Services as Part of a County Health Department.

Dr James R. Reuling Elected A.M.A Vice Speaker

DR. JAMES R. REULING, Bayside, treasurer of the Medical Society of the State of New York and delegate to the American Medical Association was elected vice-speaker of the A.M.A., at the 97th annual session held from June 21 to 25, in Chicago

Dr R. L. Sensenich, South Bend, Indiana, was installed as president of the A.M.A for the coming year and Dr Ernest Edward Irons, Chicago was chosen as president-elect.

Dr Irons will take office at the 1949 meeting, to be held in Atlantic City New Jersey, from June 6 to 10

The 1950 session will be held in San Francisco, and the 1951 session in Atlantic City the A.M.A. House of Delegates voted.

New Book on Tuberculosis Distributed

PROVISION of adequate personal service and relief for tuberculous families is discussed in a pamphlet written by Bailey B Burritt and recently published by the State Charities Aid Association State Committee on Tuberculosis and Public Health.

Entitled *Life, Death and Tuberculosis As Affected by the Standard of Living*, this new 16-page pamphlet emphasizes the importance of the human element in tuberculosis control and deals with specific health and welfare problems of tuberculous individuals and their families

In presenting his concepts for dealing with the tuberculous patient and his family, Mr Burritt shows the need for strengthening social and economic standards of living as an essential part of successful treatment of tuberculosis He further points out that a considerable number of patients leaving hospitals against advice and the number of patients with active tuberculosis still at large in the community are evidences of failure to secure the cooperation of patients and their families in protecting themselves and their community by treatment

The pamphlet makes specific suggestions for public health and public welfare officials and voluntary tuberculosis workers with regard to their cooperation in securing adequate personal service and relief for tuberculous families

New York Exhibitors Receive Awards at A M A Convention

SEVERAL certificates of merit and honorable mentions were received for scientific exhibits shown by New York State physicians at the 97th annual session of the American Medical Association, held in Chicago in June

In Group I, for exhibits of individual investigation, judged on the basis of orginality and excellence of presentation, certificates of merit were awarded to Dr Richard H Lyons, Syracuse University Medical School, for the exhibit, "Autonomic Blockade with Tetraethylammonium," and to Dr David Lehr, New York Medical College, Flower and Fifth Avenue Hospitals, New York City, for the exhibit on "Low Toxicity of Sulfonamide Combinations"

In Group I, honorable mentions were awarded to Dr Helen Ollendorff Curth, Columbia University College of Physicians and Surgeons, New York City, on "Cancer and Acanthosis Nigricans," and to Drs Irving S Wright, Charles D Marple, and Dorothy F Beck, Committee for the Evaluation of Anticoagulants in the Treatment of Coronary Occlusion with Myocardial Infarction, American Heart Association, New York City, on "Anticoagulants in the Treatment of Coronary Occlusion with Myocardial Infarction"

Awards in Group II, for exhibits which did not exemplify purely experimental studies, judged on the basis of excellence of presentation and correlation of facts, included honorable mentions to Dr Michael A Rubinstein, Montefiore Hospital, New York City, on "Multiple Myeloma—Its Relation to Leukemia," and to Drs John D Stewart, Sidney M Schaer, W H Potter, and Alfred J Massover, University of Buffalo School of Medicine, Buffalo, on "Management of Massively Bleeding Gastroduodenal Ulcer"

Public Health Officers Attend World Assembly

FIVE commissioned officers of the Public Health Service are included in the 17-member delegation from the United States to the first World Health Assembly which opened in Geneva, Switzerland, June 24

Chief delegate from the United States is Dr Thomas Parran, special consultant of the International Children's Emergency Fund of the United Nations and former Surgeon General of the Public Service

Alternate delegates to the Assembly include Dr James A Doull, chief of the Office of International Health Relations, and Dr H Van Zile Hyde, now on detail to the Department of State from the Public Health Service

Among the special advisers to the United States delegation are Miss Lucile Petry, chief, Division of Nursing, who will serve as consultant in the field of nursing, and Dr Morton Kramer, chief of information and research, Office of International Health Relations, adviser on relationships with the United Nations

State Broadens Occupational Therapy Program

EXTENSION of occupational therapy to all patients whom it can benefit in the 26 hospitals and schools of the New York State Department of Mental Hygiene has been made possible by the provision of 209 new positions, Dr Frederick MacCurdy, commissioner of mental hygiene, announced recently He added that the positions were available as of the first of June through funds recommended by Governor Dewey in his 1948-1949 budget and subsequently approved by the State Legislature

MEETINGS

FUTURE

Bureau of Social Hygiene, New York City Department of Health

A comprehensive series of lectures and demonstrations on the diagnosis, treatment and management of venereal diseases will start at the New York City Department of Health on Saturday morning September 18. There will be 14 weekly meetings presided over by experts in the various special fields of venereal disease control. Sessions will start at 10 30 A.M., and will be held in the second floor auditorium of the Health Department 125 Worth Street, New York City.

The schedule of lectures includes: September 18—'Practical Aspects of Immunity in Venereal Disease'; September 25—'Treatment of Gonorrhea'; October 2—'The Public Health Nurse's Part in the Venereal Disease Control Program' October 9—'Treatment of Early Syphilis'; October 16—'Late and Latent Syphilis' October 23—'Interviewing the Venereal Disease Patient' October 30—'Cardiovascular Syphilis' November 6—'Treatment of Neurosyphilis'; November 13—'Human Relations and the Venereal Disease Patient'; November 20—'Workmen's Compensation Aspects of Venereal Disease'; November 27—'Interpretation of Serologic Reports'; December 4—'Advances in the Treatment of Minor Venereal Disease' December 11— Syphilis in Pregnancy, and December 18—'Differential Diagnosis of Early Syphilis.

Central Association of Obstetricians and Gynecologists

The 16th annual meeting of the Central Association of Obstetricians and Gynecologists will be held September 23, 24, and 25 in Denver, Colorado Headquarters will be at the Shirley-Savoy Hotel. Further information may be obtained from Dr John I. Brewer secretary treasurer, 24 West Ohio Street, Chicago 10, Illinois.

National Committee for Mental Hygiene

The annual meeting of the National Committee for Mental Hygiene will be held November 3 and 4 at the Hotel Pennsylvania, New York City, with a program consisting of four scientific sessions during the morning and afternoon meetings, a business luncheon on the first day and the annual luncheon on the second day, at which the presentation of the Lasker Award will be made and the ten year national program for mental health discussed.

Further information may be obtained from the National Committee for Mental Hygiene, 1790 Broadway, New York 19, New York.

American Public Health Association

The 76th annual meeting of the American Public Health Association will take place from November 8 to 12 in Boston, Massachusetts. Representatives from all parts of the United States, from Canada, Cuba and Mexico, and from Latin American countries will attend. Delegates from Europe and Asia are also expected.

Meeting with the American Public Health Association will be many related organizations including American School Health Association, Association of Maternal and Child Health and Crippled Children's Directors, Association of Reserve Officers of the U S Public Health Service, Association of State and Territorial Health Officers, Conference of Municipal Public Health Engineers, Conference of Professors of Preventive Medicine Conference of State and Provincial Public Health Laboratory Directors, Conference of State Directors of Health Education, Council of State Directors of Public Health Nursing, National Committee of Health Council Executives and Public Health Cancer Association.

Further information may be obtained from the executive secretary Dr Reginald M Atwater 1790 Broadway New York 19, New York.

PERSONALITIES

Honored

Dr Robert Emery Brennan, director of surgery New York Polyclinic Medical School and Hospital who has been associated with the institution for many years, by the Board of Trustees who have named one of the operating rooms 'The Brennan Operating Room'' The late Dr DeWitt C Romaine by a bequest, in his sister's will, to Columbia University College of Physicians and Surgeons of $140 000 for medical research will be used to set up the Dr DeWitt C Romaine Fellowship to investigate diseases of the blood system and other medical problems.

Awarded

Dr George G Deaver professor of clinical rehabilitation and physical medicine at New York University College of Medicine and a member of the medical staff of the Institute of Rehabilitation and Physical Medicine of the New York University Bellevue Medical Center, the Medal for Merit by President Harry S Truman for his pioneer work in the field of rehabilitation Dr Frederick Lee Liebolt New York City attending surgeon and associate professor of orthopedic surgery at the New York Hospital-Cornell University Medical Center, the honorary degree of doctor of laws from the University of Arkansas.

Appointed

To emeritus status at Columbia University New York City, Dr William H McCastline, University medical officer emeritus, and Walter W Palmer, Bard professor emeritus of medicine.

Dr H. Houston Merritt former chief of the division of neuropsychiatry, Montefiore Hospital, New York City as professor of neurology and executive officer of the department of neurology of the Faculty of Medicine of Columbia University and as director of the neurological service and attending neurologist Neurological Institute, Presbyterian Hospital.

Dr Marjory J Nelson, chief medical inspector in the Mount Vernon public schools since 1944, as Barnard College physician, succeeding Dr Gulielma F Alsop, who retired June 20 after serving as college doctor for 35 years Dr Edward D Palmes, as assistant professor of preventive medicine, New York University College of Medicine, assigned to the Laboratory of Industrial Toxicology, initial unit of the Institute of Industrial Medicine

Dr John J Powers, Albany, as Albany Fire Department surgeon, to succeed Dr Francis B Maguire, resigned Dr Clyde L Randall, Buffalo, as a member of the State board of medical examiners, by the New York State Board of Regents, chief obstetrician at Buffalo General Hospital and professor of obstetrics at the University of Buffalo School of Medicine Dr Randall succeeds Dr James K. Quigley of Rochester, who resigned.

Elected

Dr Vincent E Fischer, Rochester, as first vice-president of the New York State Academy of General Practice Dr Clement J Hendron, Troy, as president of the Albany Medical College Alumni Association Dr Irwin I Lubowe, New York City, to Fellowship in the American College of Allergists

To membership in the Rensselaer Polytechnic Institute chapter of Sigma Xi, national honorary scientific society, Dr John C McClintock, Albany

Speakers

Dr Robert J Booher, assistant attending surgeon, Memorial Hospital for Cancer and Allied Diseases, and surgeon to the Pack Medical Group, New York City, at the annual meeting of the Newfoundland Medical Association held in St Johns, Newfoundland, from July 6 to 10, on "The Diagnosis and Surgical Management of Gastric Tumors" and "The Diagnosis and Management of Tumors of Soft Somatic Tissues" Dr Henry W Kaessler, Bronxville, pediatric consultant at Grasslands, Mount Vernon, and Lawrence Hospitals, on the Planned Parenthood broadcast over Station WFAS, White Plains, May 27

New Offices

Dr George Anderson, veteran of five years' service in the U S Navy Medical Corps, general practice in Ballston Spa Dr Mary A. Fyala, practice of pediatrics in Binghamton Dr Walter P Gage, who served during the war as colonel in charge of the surgical service of the 199th General Hospital, practice of gynecology and obstetrics in Cold Spring Dr Robert V Persson, of Newton Falls and Star Lake, general practice and practice of obstetrics in Potsdam Dr Alfred A Scharbius, practice of medicine and surgery in Smithtown Branch Dr Joseph Young, New York City, general practice in Lake Huntington Dr Clifford J Zeiss and his wife, Dr Ethel M Naughton, general practice in Valley Stream

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OFT IN THE STILLY NIGHT

The public, according to complaints received by the American Medical Association, believes that it is not getting the service it requires from its doctors A particular grievance is the difficulty—on occasions the impossibility—of obtaining emergency medical service at night

For various reasons a reactionary attitude toward self-sacrifice has set in since the war The devotion to a common cause in those soul-trying years elevated many persons to a heroic state of mind Now, at least in this country, "We the people" are demanding the pay-off We want things material, and we want them now

The medical profession must bear its share of this failure to see eye to eye and clearly In too many phases of its work there has been an increasing divergence from the public interest rather than an improved cordialty in public relations The trend toward socialization has been a trend also toward the impersonalization of medical service

During the war, 60 per cent of the nation's physicians—and they comprised the older group—remained at home, assuming their absent colleagues' duties They were, on the whole, overworked, but, on the whole, as old-timers they accepted the responsibilities that appeared to them to be part of the obligations of a career of service Many of them now believe that others should bear the extra burden, and this is what the others seem unwilling to undertake The youngsters seem to have failed to acquire the idea that they have accepted a calling

If an obligation implicit in the practice of medicine now fails of spontaneous fulfillment, however, some organized measures must be taken to provide what is lacking The American Medical Association suggests that county medical societies or urban groups maintain telephone exchanges that will accept the responsibility for locating physicians available for emergency calls

The majority of the older practitioners have led lives so organized that they were never, year after year, "off call" without a substitute constantly available

It is one of the responsibilities that those who care for the sick have accepted and must continue to accept Those for whom they care must never be abandoned —*The New England Journal of Medicine, May 6, 1948*

WOMAN'S AUXILIARY

TO THE MEDICAL SOCIETY OF THE STATE OF NEW YORK

COUNTY NEWS

Allegany County

Mrs. E. Stanley Webster, Friendship, was re-elected president of the Auxiliary to the Allegany County Medical Society, at a meeting held in May at the St. James Hotel, Cuba. Also re-elected to office were Mrs. Loren Bly, Cuba vice-president, and Mrs. E. W Briggs, Wellsville, secretary treasurer

At the last meeting of the group, held July 8 in Cuba, plans were made for a charity card party to be held in September at the Bolivar Country Club The Auxiliary's nursing scholarship fund will benefit.

Broome County

At the annual meeting of the Broome County Auxiliary held in June at Lawson s Town House, Binghamton, Mrs Windsor R. Smith was re-elected president for the coming year In addition to the election of officers, reports of the convention were made, and yearly reports of committees were mimeographed and distributed to members. A luncheon was held in conjunction with the meeting.

A report was given on a visit of several members at a meeting of the Onondaga County Auxiliary, in Syracuse.

The group will offer a nursing scholarship fund this fall to a Broome County applicant.

Columbia County

Members of the 1948 graduating class of the School of Nursing of the Hudson City Hospital and Miss Helena Klassen, director of nursing at the hospital, were guests of honor at a luncheon of the Columbia County Auxiliary held June 1 in connection with the annual meeting in Hudson

Mrs. Ralph F Spencer, president, was in charge of the business meeting which preceded the luncheon.

Erie County

Mrs. Ralph Upson Snyder took office as president of the Erie County Auxiliary, succeeding Mrs Arthur Lawton Bennett, at a luncheon meeting, May 25 in Buffalo Other new officers are Mrs. Clarence J Durshordwe president-elect Mrs Roland B. Carr, first vice-president Mrs. Elmer A. D Clarke second vice-president Mrs. Charles R. Borzillieri Jr , recording secretary Mrs. George F Marquis, corresponding secretary Mrs Victor L. Cohen, treasurer, and Mrs. John D Naples, director for three years

Mrs. Carr, delegate to the State convention gave a detailed report of the meetings and the chairmen of standing committees gave their annual reports.

At a recent meeting of the Chautauqua County Auxiliary Mrs. Bennett Mrs. Durshordwe and Mrs. Lee R. Sanborn, editor of *The Distaff* publication of the State Auxiliary, were guests, giving help and suggestions for various projects.

On June 16 Mrs. Upson, the new president, held a business meeting, at which Mrs. Norman F Grasor, program chairman, announced plans for a benefit party in October for the project fund. The Auxiliary's project will be the maintenance of two scholarship loans for student nurses.

Fulton County

Under the direction of Mrs. Herbert Hageman, retiring president, the Fulton County Auxiliary had an active year, with a guest speaker for each monthly meeting These included Mrs. Thomas E. Bullard Schuylerville, who spoke on Fifty Years a Doctor's Wife and a British exchange teacher, Miss R. E. Ross, who spoke on the practice of medicine in England and the panel system of medical practice.

As an Auxiliary project, medical supplies valued at $260 were collected for shipment overseas. Another collection of medical supplies is planned for the fall.

The summer meeting of the Auxiliary will include a picnic at the summer camp of Mrs. Harriet Pannaci, Caroga Lake.

Mrs. R. E Kunkel is the new president of the group

Kings County

The first meeting of the new year will be called by the president of the Kings County Auxiliary, Mrs. Charles E Scofield on September 14 No summer meetings will be held

A bridge and food sale is planned for Tuesday October 26 the committee has announced.

Madison County

Members of the Madison County Auxiliary were guests recently at the last meeting of the Onondaga County Auxiliary, in Syracuse, at which Mrs Edgar M Neptune, State president, was principal speaker

No meetings of the group are planned for the summer, but an outing will be held, to include a trip and luncheon within driving distance of the members homes.

Mrs. E. W Carpenter is president of the Madison County Auxiliary

Oneida County

The Oneida County Auxiliary held its annual meeting and election of officers on May 25, winding up the activities for the year until September when plans for the next year's program will be made. Mrs Arthur Gaffney is president of the group

The project of supplying books to the Oneida County Hospital is continuing throughout the summer and the work to increase the nursing scholarship fund is continuing the group reports.

Orange County

With 30 members present, members of the Orange County Auxiliary met on June 16 for a luncheon meeting at the home of Mrs. G Otto Pobe Port Jervis. The business meeting was conducted by Mrs. John Ross, Middletown president. The Auxiliary agreed to assist the County Medical

Society in October when it will be host to the First District Branch meeting, in Newburgh

Program for the June meeting was a fashion show, presented by several members, demonstrating "What the well-dressed doctor's wife should and should not wear"

At the May meeting of the executive committee, held at the Orange County Golf Club with Mrs Ross as hostess, chairmen of all standing committees and members of special committees were appointed

The nurse scholarship committee reported that the Auxiliary is offering each year two scholarship loans, not exceeding $100 a year, to Orange County girls who "shall satisfy the scholarship committee as to requirements and character references and who shall have a letter from an approved New York State school of nursing" Mrs W Hasbrouck Snyder, Newburgh, is chairman of the scholarship fund committee The scholarships were awarded July 15 for the fall classes

Queens County

The Queens County Auxiliary held the last stated meeting of the season on May 25, with Mrs Daniel Swan, president, in charge A report of the State convention was given by Mrs Samuel Klein, president-elect, including the information that three past presidents of the Queens County Auxiliary have been elected to State Auxiliary offices—Mrs William LaValle, president-elect, Mrs Thomas D'Angelo, recording secretary, and Mrs Joseph Hallinan, archives

Mrs Ezra Wolff reported a profit of over $1,000 from the variety amateur show held May 15 The proceeds will be used for the various hospitals Plans for a dinner dance on November 13 at the North Hills Country Club were made Guest speaker at the May meeting was Mrs Ruth Kistner, who gave a talk on "Flower Arrangements"

Rensselaer County

Officers for the coming year were elected at the annual luncheon meeting of the Rensselaer County Auxiliary, held May 12 in Troy Mrs Wilbur H. Caney will serve as president, and other officers are Mrs Samuel J Werlin, president-elect, Mrs Clement J Hendron, first vice-president, Mrs Charles Bessey, second vice-president, Mrs Henry F Albrecht, Jr, recording secretary, Mrs Warren St John, corresponding secretary, Mrs David Tomlinson, assistant corresponding secretary, Mrs J Clarke Burke, treasurer, and Mrs Sidney Lewis, assistant treasurer

Named to the Board of Directors were Mrs John J Quinlan, retiring president, for three years, Mrs Nicholas F Brignola, two years, Mrs Victor C Jacobsen and Mrs Sherman W MacIlmoyl, one year

Richmond County

Meeting on June 23 at the Richmond Memorial Hospital, members of the Richmond County Auxiliary elected officers for the coming year, including Mrs Joseph F Worthen, president, and Mrs John Goller, president-elect

Mrs Edward Klauber, Mrs Leif G Jensen, Mrs Goller, and Mrs Worthen gave a report on the State convention, and annual reports were presented by committee chairmen and officers

In her talk to the group, Mrs Worthen stressed the three main purposes of the Auxiliary "cooperation with the Medical Society, to act as liaison between the medical profession and the public, and to give special attention to legislation, public health, and public welfare"

The next meeting of the Auxiliary will be held September 21

Saratoga County

A picnic, to which all doctors' wives of Saratoga County were invited, and a final meeting of the summer was held in July by members of the Saratoga County Auxiliary at the Homestead Sanatorium, Middlegrove

Mrs T J Goodfellow is president of the group

Seneca County

Activities of the Seneca County Auxiliary, of which Mrs Robert Gibbs is president, have included two meetings in May, the formation of a constitution, and a joint picnic for doctors and their wives, held July 11 at Cayuga Lake

Tompkins County

Members of the Tompkins County Auxiliary held their annual membership tea at the Biggs Hospital, Ithaca, on June 15, with Mrs Edgar M Neptune, State president, and four members of the Onondaga County Auxiliary, as guests

Also present as guests were the president and four members of the Schuyler County Auxiliary

At the May meeting of the group, held in the Cornell Infirmary Library with 24 members present, Mrs Norman S Moore reported on the State convention and plans for the year's work were made.

Warren County

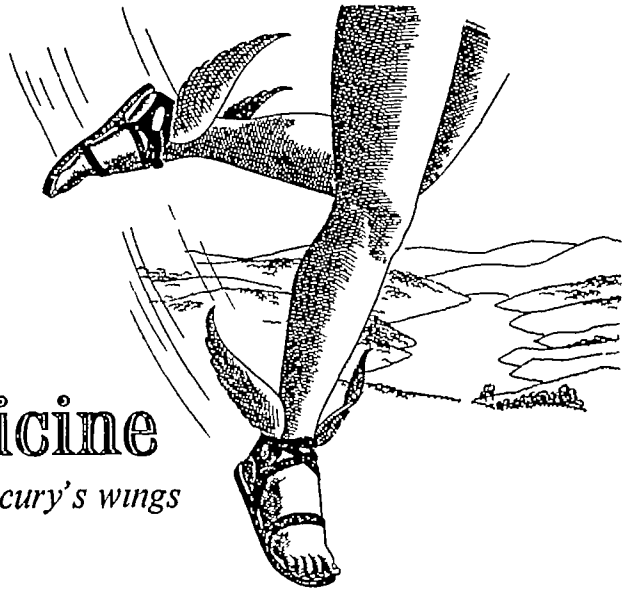
Meeting with the Warren County Medical Society, the Warren County Auxiliary had a joint dinner meeting at the Glens Falls Country Club in May, at which all officers were re-elected for the coming year Mrs E J Fitzgerald is president

Wayne County

Mrs Edgar M Neptune, State Auxiliary president, was guest speaker at a luncheon meeting of the Wayne County Auxiliary, held at Williamson in June The theme of her address centered around the possible organization of an international world health group Mrs Neil Paul, vice-president of the Onondaga County Auxiliary, spoke on "The Responsibilities of Doctors' Wives," stressing the importance of one hundred per cent membership in the Wayne County Auxiliary Mrs Charles Gruen, Lyons, spoke on "Social Responsibilities of Doctors' Wives in Small Communities" and told how six new county auxiliaries have been organized during the past year

Mrs Charles Steyaart, recently elected president, was in charge of the meeting Other officers include Mrs James Arseneau, president-elect, Mrs Myron Carmer, vice-president, Mrs George Pasco, secretary, and Mrs Norbert Menuhin, treasurer

A joint meeting of the Wayne County Medical Society and the Auxiliary has been scheduled for August



Medicine

wears Mercury's wings

Contemporary Medicine moves forward at an astonishing pace

Within the span of one decade 1937 1947, the annual number of deaths from acute respiratory diseases declined by *70%* In 1947 the collective mortality rate for the communicable diseases of childhood was only *one-sixth* that of 1937

Contemporary Medicine is a story of progress achieved through cooperative effort a story of enlightened teamwork on the part of the clinician the research worker and Pharmacy as exemplified in the modern pharmaceutical laboratory

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BOOKS

Books for review should be sent to the Book Review Department at 1313 Bedford Avenue Brooklyn, N Y Acknowledgment of receipt will be made in these columns and deemed sufficient notification. Selection for review will be based on merit and interest to our readers

RECEIVED

Barbed-Wire Surgeon By Alfred A Weinstein, M D Octavo of 310 pages New York, Macmillan Company, 1948 Cloth, $3 00

Sex Variants. A Study of Homosexual Patterns By George W Henry, M D With sections contributed by specialists in particular fields One-volume edition Octavo of 1130 pages, illustrated New York, Paul B Hoeber, 1948 Cloth, $8 00

The Back and Its Disorders By Philip Lewin, M D Octavo of 157 pages, illustrated New York, McGraw-Hill Book Co , 1948 Cloth, $2 50

Coronary Heart Disease By A Carleton Ernstene, M D Octavo of 95 pages Springfield, Ill , Charles C Thomas, 1948 Cloth, $2 50

The Driving Forces of Human Nature and Their Adjustment. An Introduction to the Psychology and Psychopathology of Emotional Behavior and Volitional Control. By Dom Thomas Verner Moore, M D Octavo of 461 pages, illustrated New York, Grune & Stratton, 1948 Cloth, $6 50

Motivation in Health Education. The 1947 Health Education Conference of the New York Academy of Medicine Octavo of 53 pages New York, Columbia University Press, 1948 Cloth, $1 00

Peripheral Vascular Diseases Diagnosis and Treatment. By David W Kramer, M D Octavo of 620 pages, illustrated Philadelphia, F A. Davis Co , 1948 Cloth, $8 00

Glomerular Nephritis Diagnosis and Treatment. By Thomas Addis, M D Octavo of 338 pages, illustrated New York, Macmillan Company, 1948 Cloth, $8 00

The Hospital Care of Neurosurgical Patients By Wallace B Hamby, M D Second edition Octavo of 156 pages, illustrated Springfield, Ill , Charles C Thomas, 1948 Cloth, $3 00

The Biological Standardisation of the Vitamins By Katharine H Coward, D Sc Second edition Octavo of 224 pages, illustrated Baltimore, Williams & Wilkins Co , 1947 Cloth, $5 00

Synopsis of Pediatrics By John Zahorsky, M D , assisted by T S Zahorsky, M D Fifth edition Duodecimo of 449 pages, illustrated. St Louis, C V Mosby Co , 1948 Cloth, $5 50

The March of Medicine The New York Academy of Medicine Lectures to the Laity, 1947 Octavo of 109 pages New York, Columbia University Press, 1948 Cloth, $2 00

Human Neuroanatomy By Oliver S Strong and Adolph Elwyn Second edition Quarto of 442 pages, illustrated Baltimore, Williams & Wilkins Co , 1948 Cloth, $6 00

The 1947 Book of Pathology and Clinical Pathology Pathology edited by Howard T Karsner, M D Assistant editor, Herbert Z Lund, M D Clinical Pathology edited by Arthur Hawley Sanford, M D Duodecimo of 558 pages, illustrated. Chicago, Year Book Publishers, 1948 Cloth, $3 75

Conference on Metabolic Aspects of Convalescence Transactions of the Fifteenth Meeting, New York, N Y , March 31–April 1, 1947 Edited by Edward C Reifenstein, Jr , M D Octavo of 163 pages, illustrated New York, Josiah Macy, Jr , Foundation, n d Paper, $2 25

Bodies and Souls By Maxence van der Meersch Translated by Eithne Wilkins Octavo of 654 pages Chicago, Pellegrini & Cudahy, 1948 Cloth, $3 75

Psychiatric Examination of the School Child. By Muriel Barton Hall, M D Octavo of 368 pages, illustrated Baltimore, Williams & Wilkins Co , 1947 Cloth, $4 50

Gardiner's Handbook of Skin Diseases Revised by John Kinnear, M D Fifth edition Duodecimo of 250 pages, illustrated Baltimore, Williams & Wilkins Co , 1948 Cloth, $4 50

REVIEWED

History of the American Medical Association, 1847 to 1947 By Morris Fishbein, M D With "The Biographies of the Presidents of the Association" By Walter L Bierring, M D Octavo of 1,220 pages, illustrated Philadelphia, W B Saunders Company, 1947 Cloth, $10

Dr Fishbein has edited a handsome history of the American Medical Association which runs into some 1,200-odd pages There is a wealth of information about the early days of the Association, biographies of past presidents, and information regarding the councils, bureaus, and publications of the organization There is a miscellaneous collection of appendices and a complete index

A work of this sort might have been either very dull or very highly controversial in view of the present conflicting opinions in the profession regarding the Association's status Most of the material turns out to be extremely interesting The biographies of the presidents show the wide variety of men to whom the fortunes of the Association have been entrusted On the whole, they seem to have been an unusually outstanding group

The history can be recommended to those, and there should be many, who will want to consult a history of this body It will not satisfy those who look for a statement of broad philosophic principles or words of wisdom or vision concerning the possible future role of the Association in American society However, this is scarcely the purpose of a history, and a very satisfactory one it is

MILTON PLOTZ

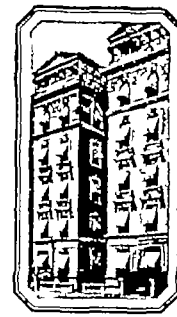
[Continued on page 1754]

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[Continued from page 1752]

A Manual of the Common Contagious Diseases By Philip Moen Stimson, M D Fourth edition Duodecimo of 503 pages, illustrated Philadelphia, Lea & Febiger, 1947 Cloth, $4.00

Dr Stimson has been teaching the common contagious diseases to medical students for the past twenty-five years Long experience has given him the insight required to write a clear, concise, complete, easily readable description of these diseases No effort seems imposed in obtaining all the essential elements, all that are new The book is an authoritative text for medical and nursing students and a helpful reference for practitioners

KENNETH G JENNINGS

Clinical Practice in Infectious Diseases. For Students, Practitioners and Medical Officers By E H R Harries, M D , and M Mitman, M D Third edition Octavo of 679 pages, illustrated Baltimore, Williams & Wilkins Company, 1947 Cloth, $6 00

Perhaps the strongest impression an American reviewer gets of this book is that fundamental English virtue, thoroughness The subject is well covered and the chief difference between English practice and American would seem to be hospital arrangements It is interesting to observe, apparently from traditional persistence of Victorian reserve, that "the axilla or groin are the sites usually employed" for taking temperatures The authors also find it necessary to say that "sterile syringes and needles must be used " Nevertheless, they are well up in their therapy, including the sulfonamides and penicillin Even streptomycin is mentioned, though it was hardly in use here when the book was written

W D LUDLUM, SR.

Overcoming Stammering By Charles Pellman Octavo of 160 pages New York, Beechhurst Press, 1947 Cloth, $3 00

The author of this small book discusses some of the theories of stuttering One chapter is on correction of stammering and one on how to help the child overcome stammering A statement on the flap of the book is to the effect that the author presents a fresh point of view in that the treatment of stammering is based upon the physiology of speech and proper mental hygiene, rather than the functioning of the breathing apparatus This is like tilting with wind mills, since no one today regards stuttering as being due to a malfunction of the breathing apparatus

I W KARLIN

Surgical Pathology By William Boyd, M D Sixth edition Octavo of 858 pages, illustrated Philadelphia, W B Saunders Company, 1947 Cloth, $10

The new edition of this classic book on *Surgical Pathology* is noteworthy for its section on developments in the surgery of heart disease A most welcome amendment deals with the pathology of backache due to fibrositis This book needs no recommendation Every surgeon and internist should own and refer to a copy regularly

ANDREW BABEY

Developmental Diagnosis Normal and Abnormal Child Development. Clinical Methods and Pediatric Applications. By Arnold Gesell, M D , and Catherine S Amatruda, M D Second edition Octavo of 496 pages, illustrated Philadelphia, Blakiston Co , 1947 Cloth, $7 50

Child growth and development has become an increasingly absorbing topic Those who are called upon to aid parents in rearing their children must take cognizance not only of physical well-being but of mental status as well Too little time is often given to proper evaluation of the child's behavior patterns Diagnostic problems involving the Rh factor, prenatal rubella, congenital anomalies, cerebral injuries, blindness, deafness, etc , make the book a valuable addition to an office library

THURMAN B GIVAN

The Years After Fifty By Wingate M Johnson, M D Large duodecimo of 153 pages New York, Whittlesey House, 1947 $2 00

To prepare for "The Years After 50" this interesting volume should be read, of course, by those who have not yet reached that age It is delightful reading and for the intelligent laymen most instructive Two chapters are especially recommended, the one on "Blood Pressure, High and Low," and the other on "Diseases of the Heart and Blood Vessels " The frequent tactless handling of hypertensive cases by many doctors has, in the words of an eminent clinician, "done mankind more harm than good "

Another chapter recommended to the doctor as well as the laymen is the one on "Preparing for Old Age " What a wealth of important suggestions it contains! The reviewer is convinced it will teach one how to be happy while growing old

S R. BLATTEIS

Kompendium der Parasitschen Würmer im Menschen By Dr Hans A Kreis Octavo of 136 pages, illustrated Basel, Switzerland, Benno Schwabe & Co , 1947 Cloth, 10 fr

The increase of worm infestations in the Swiss population during the last war has induced the author to write this book It contains a complete, although short, description of the natural history of the parasites which are endemic in Switzerland The paper, the print, and the pictures throughout the book are remarkably good

MAX G BERLINER

Peripheral Vascular Diseases (Angiology) By Saul S Samuels, M D Second edition Octavo of 85 pages New York, Oxford University Press, 1947 Cloth, $2 50 (Oxford Medical Outline Series)

This book covers both the medical and surgical aspects of angiology It is presented in outline form, with blank pages for the convenience of taking notes In his preface, the author stresses the fact that a specialist in peripheral vascular diseases should be a surgeon as well as an internist This, however, is argumentative The author presents again and again the different tests for peripheral vascular diseases He also discusses the anatomy of the autonomic nervous system This book, on the whole, can be very well recommended for quick reference, especially as to treatment

VINCENT ANNUNZIATA

Histopathology of the Ear, Nose and Throat. By Andrew A Eggston, M D , and Dorothy Wolff, Ph.D Quarto of 1,080 pages, illustrated Baltimore, Williams & Wilkins Co , 1947 Cloth, $18

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[Continued on page 1757]



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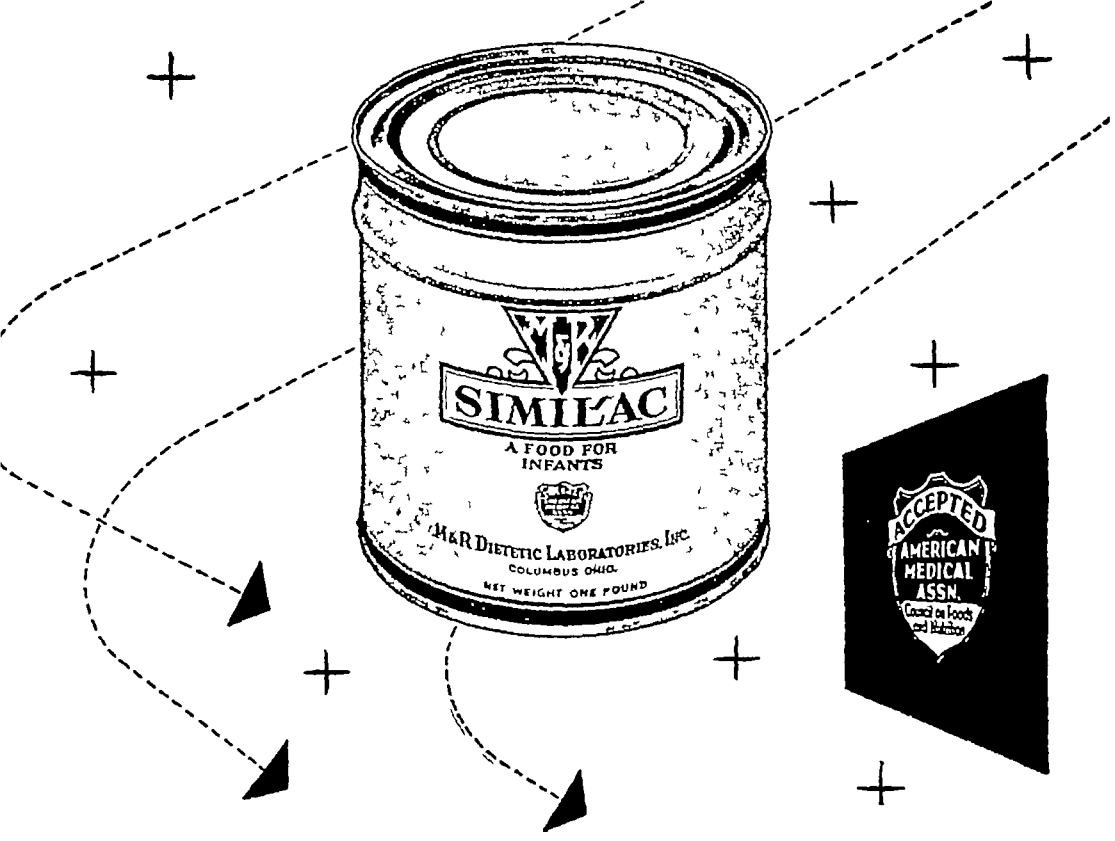
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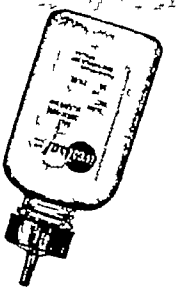
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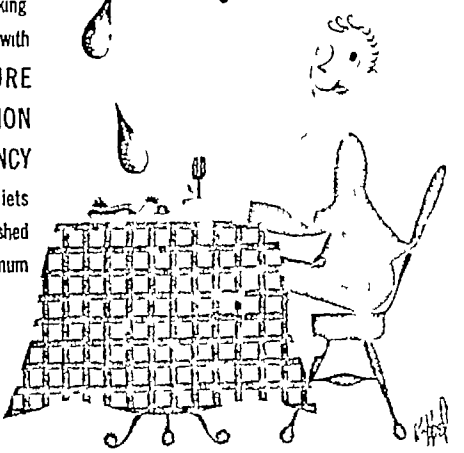
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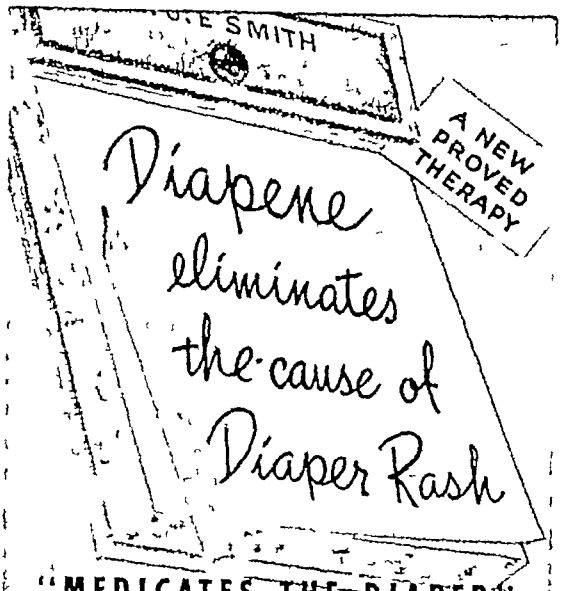
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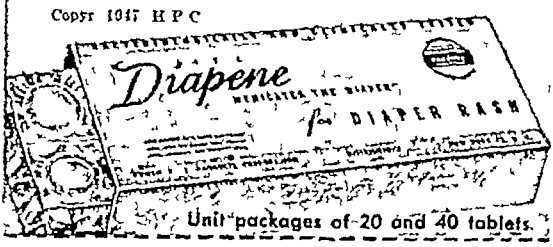
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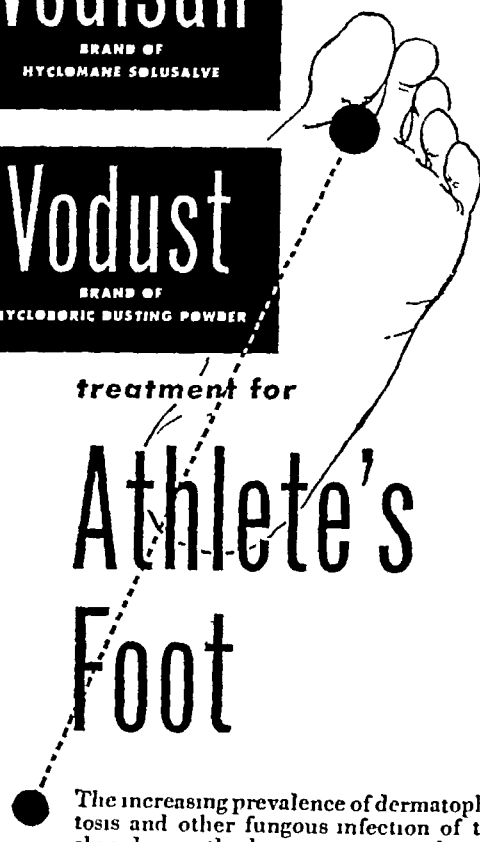
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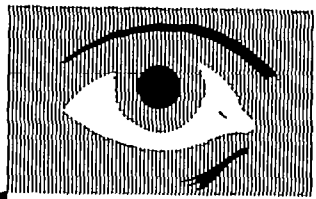
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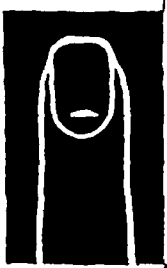


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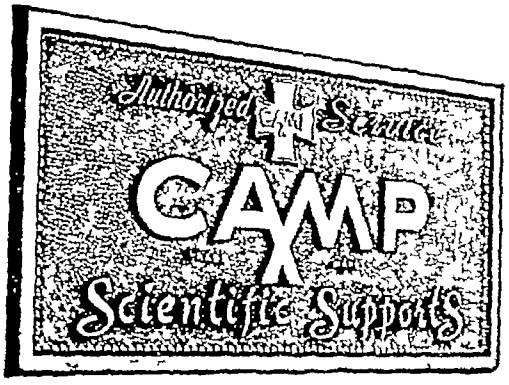
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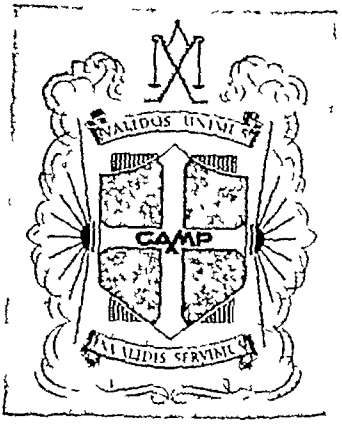
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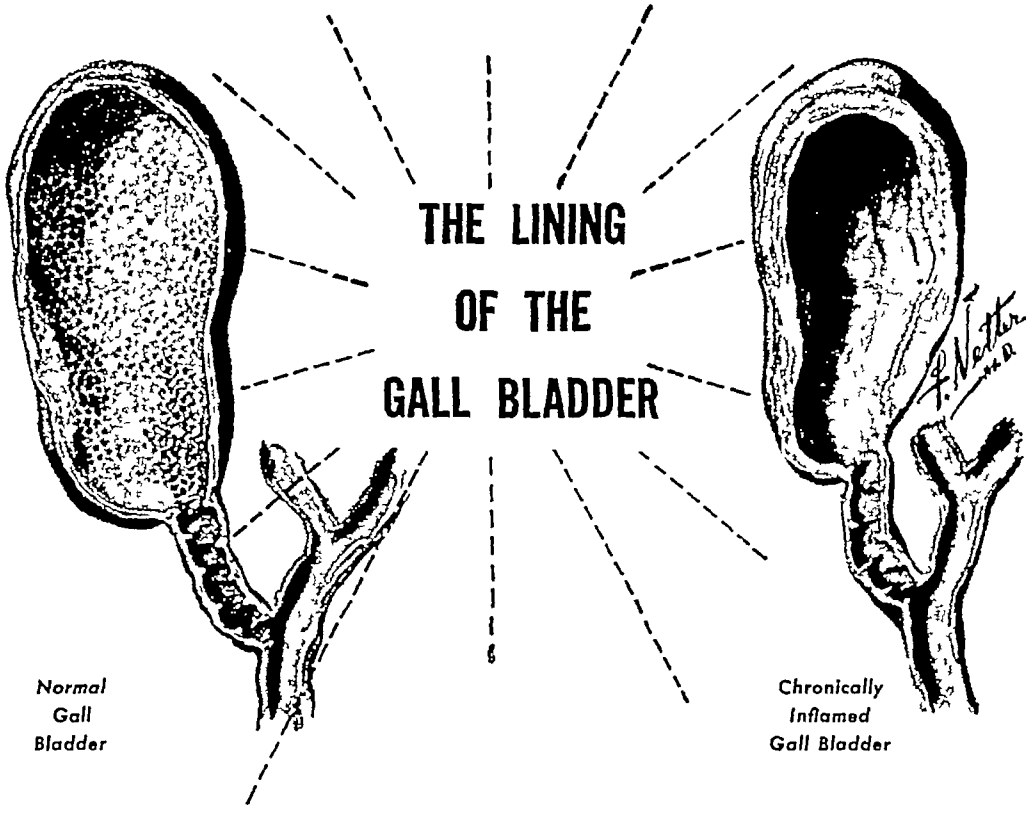
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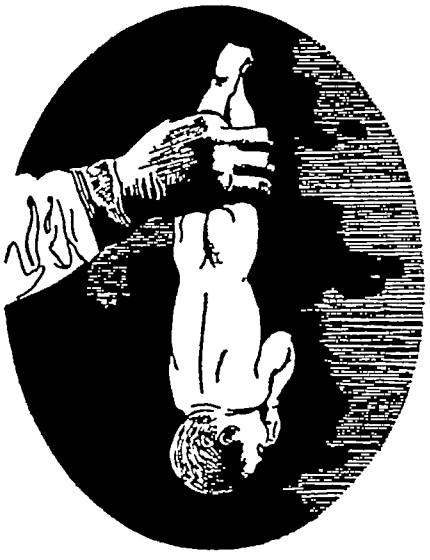
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VOLUME 48 AUGUST 15, 1948 NUMBER 16

Editorials

World Health and World Economy

Recently, five more nations—Brazil, Bulgaria, France, Romania, and the United States of America—officially accepted the constitution of the World Health Organization. This makes a total of 43 countries which have formally joined WHO, including 33 UN members and ten nonmembers Several other nations are now taking final steps toward ratification, among them the Dominican Republic, Pakistan, and Venezuela

The first World Health Assembly was held at Geneva, Switzerland, on June 24 of this year with nearly all nations of the world expected to attend through their representatives. The significance of this first assembly to the furtherance of world health and the eventual improvement of world economy can scarcely be comprehended at this time Dr A. Stampas, chairman of the WHO interim commission said

> The principal task of the Assembly is to secure international agreement on the best means of applying available knowledge and resources to the prevention of avoidable suffering and the raising of standards of health [1]

It seems obvious that, if all the resources of the health sciences were made globally effective by concerted, positive action on the part of the nations of the earth, the effect, in time, of such a program would surely be a stimulus to productive effort the like of which has never been seen While the initial plan contemplates concerted international attack on four fronts, malaria, maternal and child health, venereal diseases, and tuberculosis, activity for 1949 is suggested in 44 medical, medicosocial and other related fields

Progress is reported in the work on a universal pharmacopoeia The Expert Committee on the Unification of Pharmacopoeias made several important decisions and agreed, among other things, that proprietary drugs should be included in the international pharmacopoeia. It was also decided that a

[1] W.H.O Newsletter June 15 1948, Vol. II Number 6

list of usual and maximal doses should be prepared and advice from the medical profession sought before submission to the next meeting of the Committee The question of doses for children was raised, but the Committee felt that for the moment no action should be taken In addition, it was agreed in the case of injection to specify the route of administration At this session, the second of its kind, further progress was achieved toward setting up a unified system of nomenclature to provide that the same name should represent a drug of the same potency and composition in all countries

Thus, standardization on a universal basis commences slowly but surely This unification is fundamental in the program of positive action which the WHO is initiating In discussing the liberation of men everywhere from the overhanging dread of preventable disease, President Truman, as he signed the joint resolution of the Congress of the United States, said

> In doing so, through the World Health Organization we once again testify to our faith in the United Nations as the great instrument for reaching those goals of common understanding and mutual helpfulness among nations which alone can lead to peace and security for all peoples

At present about three hundred million persons are stricken with malaria each year Of these, approximately three million die, and millions more are left mentally and physically deteriorated The latter suffer from decreased working efficiency and so contribute to the world's acute food shortage

The proposed WHO program for 1949 in the field of maternity and child health aims at reducing the large number of preventable deaths among infants and mothers and controlling the high incidence of communicable and other preventable diseases among children Governments would be assisted to develop facilities and services for adequate maternity care and to give infants the best possible chance of survival through normal physical development, mental and emotional health, and freedom from preventable disease To help achieve these aims, it is proposed that the following studies be initiated in 1949 causes and methods of reducing maternal, infant, and childhood morbidity and mortality, child guidance and the mental health of children, and the social aspects of the problem

Each year almost fifty million people suffer from tuberculosis Of these, about five million die The Interim Commission points to these high morbidity and mortality rates and to the rapidly rising graph of tuberculosis cases in many parts of the world as added reasons for the imperative need of an international tuberculosis control program

Increase of incidence of venereal diseases because of the war, deterioration of control measures in the postwar period, and speedy international travel are among the factors that make an international control program imperative Added reasons given by the Interim Commission are the record of effective international cooperation in this field and the availability of new technics and therapeutic agents not yet fully exploited

The recommended plan, which places special emphasis on syphilis, will give governments assistance in national and local control based on modern scientific measures and will promote widest and most effective use of new drugs and improved technics of control between nations

Recognizing that the newborn World Health Organization could not possibly develop and initiate programs for all the important health matters requiring international action, the Interim Commission proposes that the main field of activity in 1949 be limited to malaria, maternal and child health, tuberculosis, and venereal diseases However, programs are also outlined for a number of other global health problems with recommendations for particular attention to alcoholism, drug addiction, hygiene of seafarers, influenza, nursing, nutrition, rural hygiene, and schistosomiasis

Current Editorial Comment

Wanted by the FBI. We are glad to cooperate with the Federal Bureau of In-

vestigation in printing the following announcement concerning a man who has been defrauding physicians and hospitals, and who may appear in this area. We suggest that New York State physicians read the announcement carefully, since this fugitive may approach any one

Hugo Bob Hubsch, with aliases Robert C Glass, R. C Harris, Hogo Hobsch, Louis S Miller, is being sought by the Federal Bureau of Investigation. On November 7, 1945 a Federal Grand Jury at Jackson Mississippi, returned an indictment charging this man with a violation of the National Stolen Property Act. He is charged with another violation of the National Stolen Property Act in a complaint filed with a U S Commissioner at Birmingham, Alabama, on June 7, 1948 This individual has defrauded numerous physicians and hospitals in Eastern and Southeastern sections of the United States during the past few months through the medium of fraudulent checks

Investigation has revealed that Hubsch has a chronic kidney ailment, and it has recently been ascertained that he has a large kidney stone in the right ureter about four inches below the kidney This condition has caused local inflammation which, at varying intervals, results in almost unbearable pain. He has been advised that it would be necessary for him to undergo major surgery for the removal of the stone in the near future, and until that surgery is performed he will need frequent, if not continuous, medical attention.

This fugitive moves about rapidly in that section of the United States which is east of the Mississippi, and recently he has given numerous physicians and hospitals fraudulent checks in return for treatments, hospitalization, sedatives, and narcotic prescriptions.

The following is a composite description of Hugo Bob Hubsch age, about 52, claims to have been born in Budapest, Hungary, November 4, 1895, height, about 5 feet, six inches, weight, 140 to 170 pounds hair, dark brown, graying, eyes, brown, build, medium, race, white, nationality, believed to be naturalized American, occupations, laborer, pharmacist, scars and marks, left arm partially paralyzed, needle scars on both arms, large scars above each hip resulting from kidney operations, shrapnel scars and two bullet scars on abdomen, bridge in upper front teeth, characteristics, long nose, stooped posture.

Anyone having information concerning the whereabouts of this fugitive should immediately notify the nearest office of the Federal Bureau of Investigation or your local law enforcement agency

MEDICAL SOCIETY OF THE STATE OF NEW YORK

1948 District Branch Meetings

Date	*Branch*	*Place of Meeting*	*Time*
September 14	Fifth	Watertown	Afternoon and evening (dinner)
September 16	Eighth	Batavia	Afternoon and evening (dinner)
September 23	Third	Parrott House, Schoharie	Morning and afternoon (luncheon)
September 24 and 25	Fourth	Saratoga Springs	Friday afternoon, Saturday morning (dinner Friday evening)
September 30	Seventh	Veterans' Hospital, Canandaigua	Morning and afternoon (luncheon)
October 6	Sixth	Binghamton	Afternoon and evening (dinner)
October 20	Second	Garden City Hotel, Garden City	Morning and afternoon (luncheon)
October 26	First	Newburgh	Afternoon and evening (dinner)

The President's Page

The War Memorial



In this issue I would like to make a few remarks on a subject dear to my heart

From ancient times, honor has been accorded warriors who have fallen on the battlefield Huge monuments, giant statues, towering obelisks, these in cities and towns all over the world mark the deeds of the heroes of bygone and present days, magnificent memorials to their sacrifices

To commemorate the heroism of the thirty-two members of the Medical Society of the State of New York who were killed in action, died of wounds, or of disease incurred in service during World War II, a war memorial has been established by the Society, but a living, dynamic memorial, a mark of honor for these medical officers who did not return We can be proud of our Society's plans for this, plans which will do just honor to our dead by establishing provisions for the education of the living

Although for generations there has been talk of peace, talk of mankind living together in friendly relations with all nations and all peoples, peace in our time is yet to come If, however, we are to attain our goal of world amity, we must concentrate on the future, on our children and youth who will make the important decisions of tomorrow What better memorial, then, for those from our Society who gave their lives in the last great conflict than a plan which will provide education for their children?

The role of the physician in time of war is an important one Our profession looked upon it as a challenge and an opportunity, and faced it in a glorious manner We can ever point with pride to our record

Following the appointment of our Committee on the War Memorial, a detailed survey was made of the families of these medical officers, of their dependent children, and of their present and future education needs At this year's session of the House of Delegates, a plan was adopted whereby we, as a Society, will honor these members by providing financial aid for advanced education of their sons and daughters Fifty-eight, including thirty boys and twenty-eight girls, varying in age from four to twenty-four, are included in the listing For these we plan to contribute the sum of $600 a year when they begin their advanced education It is a sum which will not cover all expenses, but which will help with the costs and make possible college and medical school training which might otherwise have to be abandoned We may be able to enrich the medical profession of the future by thus facilitating training and education for these children of our members who served and died bravely as medical officers during the war

To create the fund for this War Memorial, each of you is assessed a small sum, $12, to be contributed before the end of this year, through your County Society, in the same manner as your regular dues Since several of the young people are ready this year to begin their higher education, it is important that our War Memorial Fund be established and ready to function at once

I am sure that we, as individuals and as associates of these whom we honor, can feel honored ourselves at this opportunity to take part in a truly living memorial, a commemoration of war heroes that will endure for many years To have a part, even though a small one, in contributing to the education of these young people is a consoling thought They will help light up their generations, and will cast their beneficent influence on their successors It is a species of immortality for us to do so

I am proud to serve as President of a group which has agreed upon such a project

LEO F SIMPSON, M.D

Scientific Articles

SOME NEWER ASPECTS OF PROTEIN METABOLISM

I Résumé of Experimental Data

DAVID SCHWIMMER, M D , and THOMAS H McGAVACK, M.D , New York City

(From the New York Medical College and Metropolitan Hospital)

THE recent war, with its military requirements and its sequel of underfed populations, has focused attention on the need for greater knowledge in the field of nutrition This has applied particularly to the problem of protein metabolism in the presence of limited intakes of calories and water

An efficient utilization of ingested proteins is essential for the proper protection and replacement of vital body tissues This is true whether the loss of protein nitrogen is occasioned by normal "wear and tear," or whether it is due to abnormal situations such as burns, hemorrhages, fractures, surgical procedures, fevers, or toxic factors. If not enough calories are fed to meet the current energy requirements, then the ingested protein is perforce burned for energy This implies that there will be no replacement of tissue proteins, or, more disastrous, there may even be a raiding of bodily protein for energy needs if the caloric deficit is very great

If, in addition to insufficient calories, the intake of water is limited, there will be a tendency to dehydration because the increased solute load raises the obligatory urinary volume needed to excrete the nitrogenous end products

Our own specific interest in this field arose with the Army Quartermaster's wartime quest for an improved ration for air force life rafts It was felt that the standard 100 Gm carbohydrate ration could be improved by supplementation with protein, provided that the objections we have already mentioned could be overcome. That protein might be utilized for other than energy production under conditions of privation was indicated by the animal studies of Swanson and of Allison, of Iowa State College and Rutgers University, respectively They demonstrated that the feeding of egg protein produced a definite lowering of the urinary excretion of nitrogen with a consequent improvement in nitrogen balance and a decrease in urinary volume. These investigators also found that supplementation of the diet with the amino acid d-l methionine further improved the utilization of nitrogen in the same directions

Our projected task in early 1945 was accordingly to check and corroborate these findings in human beings, then to transpose them quickly into specifications for a new life raft ration. The results in our earlier studies proved so interesting and delineated so many important unanswered questions that a long range program of experimentation was evolved The objective was to investigate survival rations as a whole with specific attention paid to the basic physiologic mechanisms operative during privation.

We have been unusually fortunate at the New York Medical College, Metropolitan Hospital Research Unit on Welfare Island, in having large numbers of excellent subjects capable of being observed over prolonged periods in a closed hospital ward made available to us During the past three and one-half years, we have studied the effects of 55 low calorie diets in over 200 human volunteers The latter have included both conscientious objectors and Army enlisted men

The general pattern of each experimental run has included three periods

1 Control Period (seven to ten days) subjects fed full complement of food and water

2 Deprivation Period (ten to thirty days) subjects fed specially prepared ration and specified amounts of water

3 Recovery Period (five to ten days) subjects fed gradually increasing amounts of food and water

Because of the potentially wide variability of human subjects, we have consistently employed the paired run technic This provides for a control group to be run in parallel with one or more additional groups receiving test diets containing specific experimental variables. Each test group has consisted of four to six men, and as many as 16 subjects have been observed at one time

Presented at the 142nd Annual Meeting of the Medical Society of the State of New York, New York City Teaching Day May 18 1946.

The experimental diets utilized have been in the form of specially baked, uniform biscuits and have variously provided 400 to 1,800 calories daily The intake of water has been either ad libitum with volumes strictly recorded or inflexibly limited to 800 cc daily This 800 cc figure represents the average daily expectation of a life raft castaway from the combined use of his desalination kit, solar still, and rain water collected on a tarpaulin The dietary content of protein has ranged from 0 to about 50 Gm daily

Although a great number of clinical and laboratory aspects of deprivation have been studied, we shall here report only on those pertaining directly to protein metabolism These factors can be listed as follows (1) type and quantity of protein, (2) level of caloric intake, (3) quantity of fat, (4) supplementation with d-l methionine, (5) intake of salt, and (6) level of intake of water

Let us now examine the first of these factors, the question of the type and quantity of protein used Since Mitchell assigned an arbitrary maximal "biologic value" of 1 to the perfect protein, there has been a growing appreciation of the importance of quality as against simple quantity This has been evidenced by the stress laid on balanced amino acid patterns, particularly in the development of protein hydrolysates More recently, Mitchell's rather rigid principle has been challenged by the concept of "biologic efficiency" advanced by our colleagues Swanson and Allison According to the latter, a given protein may exhibit a greater utility than that represented by the standard "biologic value" and, on occasion, may even definitely exceed Mitchell's maximum of 1 for the "complete" protein Such variability, plus the capacity to exceed the theoretical maximum, is dependent upon the state of the recipient organism As the tissues become more depleted, they acquire a greater ability to retain protein

In our early experiments, we tested rations containing a number of different protein sources These included lactalbumin, malted milk protein, raw egg albumin, dehydrated egg albumin, and dehydrated whole egg Of all these, the dehydrated egg albumin proved the most efficient and uniform, hence it has been used almost exclusively in most of our studies to date This does not preclude the possibility that some of these other proteins could be better processed and prepared to provide greater efficiency

As a matter of fact, it is quite possible that those proteins found unsatisfactory for our specific needs might prove excellent for other purposes even without modification It is the growing conviction of workers in the field that the efficiency of any protein is essentially dependent upon the job it is expected to do Among the hydrolysates, for example, some have been found very good for regenerating plasma proteins, some for rebuilding red blood cells, others for maintenance of bodily weight, and still others for promoting growth A given protein preparation may produce optimal results in one direction and be relatively useless in many others Further research will eventually elucidate the specific potentialities of the various types of protein

As we indicated earlier, the level of caloric intake may influence the fate of ingested protein to a significant degree, primarily because of the tendency to burn protein for energy When we fed our subjects rations containing 3 Gm nitrogen derived from 20 Gm dehydrated egg albumin, no utilization of the nitrogen was noted when the caloric intake was 400, 900, or 1,200 It was not until the daily intake was raised to 1,500 and 1,800 calories that any significant retention of protein nitrogen occurred

Since the basal level of urinary nitrogen excretion in subjects on protein-free diets usually averaged about 6 Gm daily, we increased the level of dietary protein nitrogen to 6 Gm in an attempt to approach positive nitrogen balance That this result was attained at 1,800 calories was not too surprising That it also occurred at the 900 calorie level was indeed unexpected It appears that a simple increase in the amount of protein fed markedly improves the efficiency of its utilization It is not yet known to what extent such increases in protein intake may be made with continuing benefit, nor is the underlying mechanism clear

The incorporation of fat in a survival ration of any sort has certain obvious advantages Since there is usually a limit on both the weight and space allotted for the storage of survival rations in any military craft, a high caloric density is greatly to be desired In addition, the inclusion of some fat in the diet can contribute to the acceptability of a ration In most of our earlier studies we included hydrogenated fat to the extent of 10 per cent by weight This figure was more or less empiric and represented a quantity that would not be likely to produce digestive disturbances In order to check the maximum amount of fat that could be used without causing digestive upsets, we set up three groups of four men each All three groups were fed isocalorically at the 900 calorie level, with each diet supplying 6 Gm of protein nitrogen The fat level, however, varied The first group received 10 per cent by weight, the second 20 per cent, and the third 30 per cent, with proportionate reductions in the amounts of carbohydrate The results were twofold First of all, no gastrointestinal difficulties were encountered with any subjects Secondly, the group receiving the 30 per cent fat ration showed a distinct decrease in the excretion

of urinary nitrogen when compared with the groups ingesting 10 per cent and 20 per cent Since the three diets were isocaloric, the nitrogen sparing effect is apparently due to something intrinsic in the higher fat content as such This observation may ultimately be applicable to specific clinical situations, which my colleague Dr McGavack will discuss in Part II of this presentation

The next phase of experimentation was an attempt to corroborate the beneficial effects of methionine supplementation on nitrogen metabolism. Three sets of paired group studies were made, with caloric levels of 900, 1,200, and 1,800, respectively In the first study, no protein nitrogen was present in the diet, in the second, 3 Gm of protein nitrogen, and in the third, 6 Gm of protein nitrogen. The methionine supplement was 5 Gm. daily in the first experiment and 2.5 Gm. in the other two The results in the methionine-fed groups, in comparison to those not receiving methionine, can be summarized as follows increased urinary volume, increased urinary solutes, increased total urinary nitrogen increased urinary urea nitrogen, greater negative nitrogen balance, increased urinary ammonia nitrogen, increased urinary potassium, and decreased serum potassium.

It is apparent from this that methionine supplementation not only did not improve nitrogen utilization but was actually associated with some deterioration. This marked difference between animals and man may perhaps be due to differences in the conditions of experimentation, but it is highly suggestive of a species difference. In this latter aspect, it most certainly emphasizes the point that one cannot and should not try to transfer bodily data from studies with animals to man.

Another aspect of these studies concerns itself with salt supplementation Our first experimental diets provided no salt, and practically all the subjects developed clinical symptoms of salt deficiency by the second day of deprivation. The manifestations consisted principally of severe muscular cramps and aches and head aches. They were associated with decreases in serum sodium and chloride concentrations and increases in serum potassium levels. Subsequent supplementation of similar diets with as little as 1 Gm. of salt daily completely prevented these changes and also seemed to have a moderately beneficial effect on protein utilization Analysis of a large series of dietary regimens wherein we added salt revealed several interesting phenomena as regards serum electrolyte concentrations. The sodium and chloride levels remained consistently normal, but the potassium concentrations almost invariably were reduced as either the caloric or the protein content of the diet was increased All these findings are highly suggestive of some relationship to adrenal cortical function and, in fact, could be correlated with alterations in the urinary excretions of total 17-ketosteroids.

The last experimental data we shall discuss here relate to the effect of fluid intake upon nitrogen utilization. Preliminary comparisons of limited (800 cc.) and ad libitum intakes of water indicate that a free intake of larger quantities of water produces a distinct increase in the excretion nitrogen. This phenomenon is being studied further to check our initial impression that it is tied up with electrolytic and steroid alterations

These experimental studies we have presented today emphasize a number of general points in addition to the specific data offered. There is far too much stress laid on the simple caloric content of the diet and not enough on the important intrinsic components thereof This is true whether we are dealing with clinical problems or whether we consider the feeding of starving populations overseas Proper feeding is essential for both physical and psychologic well being

Not only can experimental results obtained with animals not be applied directly to human beings, but also work done with human subjects must be critically evaluated Aside from considering the wide range of normal human variability, strict attention must also be paid to the actual status of the subject, whether he is healthy or sick, whether an illness is acute or chronic, whether there is depletion or starvation, or whether there has been any adaptation to adverse environment It is only by properly controlling and correlating all these factors that truly accurate answers to the multitude of nutritional and metabolic problems that confront us will be obtained

The studies here reported are important not only for military use but have implications in clinical medicine. They have a bearing on postoperative care, wound healing, general resistance to infection, hepatic diseases, and problems of obesity and cachexia.

The experimental studies herein reported were carried out at the New York Medical College Metropolitan Hospital Research Unit Welfare Island, New York, under the sponsorship of the U S. Army Quartermaster Food and Container Institute.

II Clinical Applications

THOMAS H McGAVACK, M D , and DAVID SCHWIMMER, M D , New York City

NO GIVEN set of experiments in the field of protein metabolism has yet included all the conditions or exemplified all the circumstances which must be met to answer completely the physician's needs in relation to body utilization of protein material Therefore, conclusions drawn from any one group of investigations are not necessarily capable of universal application to every type of problem in the field This should perhaps need no emphasis here, but there exists such a large mass of undigested fact within the field of protein metabolism that it seems important to keep our heads clear and accept wholeheartedly only those facts which have been repeatedly verified and satisfactorily applied at the bedside Above all, it seems necessary to avoid swings to the extremes on the basis of a few experiments, as for instance, the wave of enthusiasm for methionine as a protein supplement or the routine employment of protein hydrolysates with little attention to the nature or phase of the condition for which prescribed There are so many factors involved in the role of proteins in nutrition, e g , minerals, vitamins, the influence of one amino acid or protein upon another, the fluid intake, the condition of the tissue stores of protein at the time of administration, etc , that each fact or statement made must be accepted only in the light of the conditions under which it was established I hope this statement will stand out clearly above all others in the few comments that are to follow

Disturbances in protein metabolism commonly observed in the practice of medicine fall rather logically into the three following main groups when classified according to the nature of the protein fault (*a*) protein intake less than normal, (*b*) a specific metabolic factor altering protein metabolism, and (*c*) nonspecific stress influencing protein metabolism

In connection with the first category (Table 1), we have subjected normal human volunteers to various dietary regimes, in which the caloric equivalents ranged from 450 to 1,800 calories, and the protein complement has varied from 0 0 to approximately 0 6 Gm per Kg of body weight Dr Schwimmer's comments have been concerned with the presentation of a small portion of the data derived from these experiments Our second group of experiences deal with glandular disturbances and are summarized in Table 2 These involve, mainly, balance studies for nitrogen, various electrolytes, water, etc , before, during, and after a variety of treatments with glandular or glandular substitution products In the third group of experiments which fall in the third category (Table 3), observations have been made regarding the variations in nitrogen metabolism, especially in relation to acute and chronic infections

TABLE 1 —CONDITIONS IN WHICH PROTEIN INTAKE IS LESS THAN NORMAL

Causes	
1	Unavailability of food
2	Dietary restriction due to disease or age e g , peptic ulcer cardiac decompensation nephritis etc.
3	Failure in absorption
	(*a*) Vomiting, intestinal obstruction diarrhea ulcerative colitis, etc
	(*b*) Sprue celiac disease etc
	(*c*) Hepatic disease
Treatment	
1	Restrict fluid until condition can be corrected
2	Restrict salt until condition can be corrected
3	High quality protein easily assimilable form
4.	Parenteral feeding

TABLE 2 —CONDITIONS IN WHICH SPECIFIC METABOLIC FAULT INVOLVES PROTEIN

Causes	
1	Hematopoietic disease
2	Glandular disturbances
	(*a*) Diabetes mellitus
	(*b*) Hyperthyroidism
	(*c*) Hypogonadism
	(*d*) Hypopituitarism
3	Gout
4	Nephroses
5	Hunger edema
Treatment	
1	Increase or decrease protein or protein fraction
2	Specific therapy e g iron, liver hormones

TABLE 3 —CONDITIONS IN WHICH NONSPECIFIC STATES OF STRESS ALTER BODY CAPACITY FOR PROTEIN UTILIZATION

Causes	
1	Acute—alarm reaction trauma burns operation
2	Chronic—adaptation resistance and exhaustion—repeated infections, chronic infections etc
Treatment	
1	Acute—alarm reaction—hepatic factor
	(*a*) High quality protein
	(*b*) Glucocorticoids and mineralocorticoids
2	Chronic
	(*a*) Increase protein intake
	(*b*) Corticoid and testoid hormones

Protein Intake Less Than Normal

Fortunately, the physician should rarely have to deal with conditions in which the intake of food is limited by its scarcity in this country Nevertheless, this subject is a matter of great import to the armed services of our country and one which has occupied a considerable portion of our investigations Several interesting observations may be emphasized For instance, when both the total calories and the protein are restricted, the restriction of water, within certain limits, appears to spare body protein For example, with diets

containing between 900 and 1,800 calories and not more than 0 6 Gm protein per Kg of body weight, there was less loss of nitrogen when water was restricted to 800 cc daily than when it was used ad libitum Likewise, the presence of too much salt in the diet of such persons may aggravate the edema of the tissues and still further cripple their function, whereas too little salt can give rise to symptoms of salt deficiency and interfere with the efficiency of the kidney in ridding the body of nitrogenous waste In our own experiments, 1 Gm of salt added to diets varying in caloric equivalent from 450 to 1,800 calories and in nitrogen content from 0 0 to approximately 40 0 Gm. has improved renal efficiency without apparently interfering with tissue activity

In diets of subcaloric value, a high quality protein can exert some sparing action on the bodily economy, as it lessens the loss of nitrogen and weight and decreases the load on the liver In the present experiments, egg white has proved to be the best of such proteins, although whole egg and whole milk proteins have also demonstrated high protective activity Specific amino acid supplements, such as methionine, have not improved the action of egg white. This, of course, may have been due to the fact that under the specific conditions of our experiments the egg white already afforded sufficient methionine Keeton and his associates have confirmed the fact that methionine as a dietary supplement has not exerted a "sparing" action on protein metabolism [1] They gave 2 Gm. daily to subjects taking a calorically basal maintenance diet with adequate protein, the source of which was not stated I think these facts illustrate a point that is germane to the whole subject of applying our knowledge of protein chemistry and physiology at the bedside Shortly after methionine was shown to have a sparing action on protein metabolism in small laboratory animals under certain conditions and when it became available in readily ingested form, there was a wave of enthusiasm for its indiscriminate use wherever protein deficiency existed Not only may such therapy be both useless and needlessly expensive, but conceivably it can do harm as, for instance, in our subjects where the total urinary nitrogen and its urea and ammonia constituents invariably increased when such supplements were used

Furthermore, the amounts of an essential amino acid may vary with the nature and total amount of protein taken and the mode of its administration. This has been demonstrated at least for phenylalanine.[2] Therefore unless we have very specific indications for a particular amino acid it seems wisest in the present state of our knowledge to administer high quality protein containing all the essential amino acids rather than attempt to use expensive supplements of doubtful value

Dietary restrictions brought about by disease and failure to retain or absorb ingested food may lead to protein deficiencies (Table 1) and may be dealt with as just described Should it be necessary to give such food parenterally, then whole blood or blood plasma affords the highest quality of protein obtainable Protein hydrolysates are much less expensive and will usually make up the deficiency except in patients with severe hepatic disease but even where the liver is functioning normally, a certain percentage of the amino acid may be lost through the kidney [3]

Specific Fault in Protein Metabolism

Intrinsic disease of some organ or system may give rise to disturbances in metabolism that alter the requirements for protein both qualitatively and quantitatively (Table 2) In connection with other studies, it has been our privilege to study nitrogen and other balances under standard conditions of diet and activity in glandular disturbances which alter the behavior of protein within the body In general, these conditions must be approached by decreasing or increasing the protein intake, depending upon the nature of the derangement, and by the application of hormones or drugs specifically directed to the correction of the altered function For instance, the use of a low purine diet in gout needs no emphasis The application of insulin stops the excessive wastage of diabetes mellitus Positive nitrogen balance may be attained in hyperthyroidism by forced feeding, by the administration of corticoids, or by the use of "antithyroid" compounds

Nonspecific States of Stress Altering Body Capacity for Protein Utilization

A wide variety of acute and chronic stresses may interfere with or otherwise alter the ability of the tissues of the body to utilize protein (Table 3) It is with this group of conditions that the physician of today is most frequently faced The body reacts differently and to some extent oppositely to acute and chronic stresses respectively, more or less in accordance with Selye's concepts as expressed in the adaptation syndrome.[4] Under acute stress, that is in the alarm reaction of Selye, as seen, for instance, following trauma, burns, or operative procedure, a striking negative balance for nitrogen is established While this negative balance may be mitigated or even changed to a positive one, the catabolic process cannot be prevented, even by the use of "anabolistic hormones such as testosterone,[4-6] In cases of elective surgery, this catabolic period can be minimized by the proper diet preoperatively and by the use of large amounts of protein

during and for varying periods of time after the surgical procedure Keeton and his associates have shown that a high protein intake is the most important part of such a remedial regime [1] They achieved positive nitrogen balance during this catabolic phase by the use of a basal maintenance diet, high in protein (2 7 Gm per Kg body weight). The increase in the protein over and above that normally required is important, as we have been unable to effect positive balance by a basal maintenance diet plus 50 per cent with 1 4 Gm of protein per Kg body weight, whereas Keeton and his associates found this possible with a basal maintenance diet plus 20 per cent in which 40 per cent of the calories were derived from protein (2 7 Gm per Kg body weight) [9 1]

Immediately following conditions of acute stress, protein hydrolysates are of very slight value in relieving the negative nitrogen balance, although they may be of considerable use in building up the body store of protein when used prior to the event, e g , operation In cases of unexpected emergency, blood plasma or whole blood is preferable and at the same time is the best available source of protein, although it must be emphasized that it cannot completely prevent the catabolic phase which accompanies the alarm reaction of Selye This catabolic phase is probably secondary to intensive stimulation of the adrenal cortex with an outpouring of corticoids, particularly those concerned in gluconeogenesis

Conditions are quite different in subjects with chronic illness associated with debilitation Here the output of urinary corticoids may be low or within the lower range of normal If sufficient protein and calories can be administered, a positive nitrogen balance and eventual gain of weight can always be established in these conditions Such utilization of protein may be materially aided by the use of testosterone therapy which often stimulates the appetite and always results in a retention of nitrogen and its synthesis into new tissue

Conclusions

Our newer knowledge of protein utilization enables us to

1 Prepare more adequately for surgery than ever before

2 Decrease fatality due to rapid depletion of the body's stores of protein in conditions of acute stress such as extensive burns

3 Improve the status of patients suffering from chronic debilitating illnesses, particularly those of an infectious nature

These objectives can be accomplished by bringing the intake of protein into adequate relation with its loss and by the administration of certain hormones which regulate nitrogen metabolism, particularly those concerned with the anabolistic phases of protein activity, such as testosterone

References

1 Keeton R. W , Cole, W H., Calloway, N , Glickman N , Mitchell H. H Dymiewicz J , and Howes, D Ann. Int. Med. 28 521 (March) 1948.
2 Eckhardt R. D and Davidson, C S. J Clin. Investigation 27 165 (March) 1948
3 Selye, Hans J Clin. Endocrinol. 6 117 (Feb) 1948.
4. Cuthbertson D P Quart. J Med. 1 233 (1932)
5 Howard J E. Arch. Surg. 1 166 (1945)
6 Browne J S L , Schenker V , and Stevenson, J A. F J Clin Investigation 23 932 (1944)
7 Browne J S L. Hoffman, M , Schenker, V , Venning E H., and Weil, P G Conference on Metabolic Aspects of Convalescence Including Bone and Wound Healing Josiah Macy, Jr Foundation February 2 and 3 9th meeting, 1945
8 Browne, J S L. Presented at the Fourth Annual Protein Conference, Bureau of Biological Research, Rutgers University, New Brunswick, New Jersey, February 6 and 7 1948
9 McGavack, T H., Shearman, Anne, and Drekter, I J Bulletin New York M Coll., Flower & Fifth Ave. Hosps. 10 27 (1947)

HEMIPLEGIA PATIENTS RESPOND TO PHYSICAL MEDICINE TREATMENT

An intensive program of rehabilitation which enabled patients with partial paralysis to walk again is reported by Comdr Edward W Lowman (MC), USN, Department of Physical Medicine of the U S Naval Hospital in Philadelphia in the *Journal of the American Medical Association* (May 29)

Use of physical medicine, which proved so effective in these patients, includes massage in the first stages of treatment, application of heat and therapeutic baths, followed by active exercises in bed when the patient is able to move

The patient is encouraged to try to walk within two to eight weeks after treatment is started This is a gradual process, beginning with sitting up in bed and placing the feet on the floor from the bedside, and concluding with gymnasium exercises.

Twelve out of 18 patients with hemiplegia, paralysis of one side of the body following brain hemorrhage, responded to this reconditioning program within one hundred eighteen days Treatment was begun two to four weeks after the onset of their illness Three others of the group showed definite improvement while three did not respond to the treatment.

Nine out of ten additional patients learned to walk again after sixty-seven days of treatment, with improvement being noted in the other patient

Commander Lowman attributed the greatest factor in the success of the rehabilitation treatment to "cooperation on the part of the patient, fostered by his desire to regain his independence"—*Science News Letter, June 5, 1948*

THE ROLE AND CONTROL OF RENAL DYSFUNCTION IN CONGESTIVE HEART FAILURE

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THE kidney is uniquely related to the heart both in health and in disease of the circulation. Disturbance of this relationship in congestive heart failure leads to serious consequences *for the entire organism.* It is, *therefore, important* to determine the nature of the renal dysfunction in heart failure in the hope of developing and applying rational therapeutics A brief considera tion of the normal cardiorenal relationship will help in the understanding of the pathologic situa tion

Normally, under basal conditions, about one fifth of the cardiac output goes to supply the kid neys. This is the renal fraction of the cardiac output—almost as high as the liver fraction or the cerebral fraction From the renal plasma flow about one fifth again is pressed out during glomerular filtration to furnish the raw material for urine formation. The process of filtration also requires an adequate blood pressure, provided by the energy of the heart, to overcome the periph eral resistance of the glomerular arterioles, afferent and efferent, the osmotic pressure of the plasma proteins, and the intrarenal tissue pressure. Tubular reabsorption is mainly a process of conservation of body fluids and their contained *electrolytes* and other *essential substances,* such as glucose, amino acids, and vitamins Under normal conditions, 98 to 99 5 per cent of the glomerular filtrate is reabsorbed To prevent wide fluctuations in filtration due to changes in renal blood flow with physiologic variations in cardiac output, the kidney has an autonomous regulation of glomerular filtration pressure by the unequal constriction or dilatation of afferent or efferent arterioles [1] In the case of the afferent or proxi mal glomerular arteriole, dilatation increases both blood flow and filtration pressure while constriction reduces both flow and filtration. On the other hand, dilatation of the efferent or distal glomerular arteriole increases renal blood flow but decreases filtration pressure while constriction of this arteriole reduces blood flow and in creases filtration pressure

This mechanism of efferent constriction becomes very important in maintaining filtration pressure whenever renal blood flow is reduced in health or disease In health, renal blood flow is regularly reduced whenever more blood is required elsewhere in the body, for example, in postural changes of the circulation, in ambulation or exercise, in thermal vasodilatation of the skin *Renal blood flow is markedly reduced in all forms* of shock, whether medical, traumatic hemor rhagic, or surgical [2] Up to a point this is useful to the organism as a whole, since it diverts blood to more vital areas at a time when the cardiac out put is low However, renal function suffers, and filtration would be almost abolished, were it not for efferent constriction. It is also characteristic of established hypertensive vascular disease that glomerular filtration may be normal or only little reduced in spite of moderate or considerable decrease in renal blood flow This again means increased efferent arteriolar constriction with a high filtration fraction.[1]

Yet the most striking example of chronic efferent constriction is seen not in hypertension but in chronic congestive heart failure.[3] Here, the renal blood flow is often reduced to one third or one fifth of normal, while the glomerular filtration is reduced only to two thirds or one half Even this decrease in filtration is important in cardiac edema but things would be much worse were it not for the compensatory efferent constriction How the kidney sets off this mechanism is unknown, nor is it established just what the effector agent is, e g , renin, vasoexcitor material of Zweifach, Shorr *et al.*, or some other vasoactive substance acting singly on the efferent arteriole but, more likely, jointly with circulating epinephrine, sympathin, or other biologic com pounds [4] There is good evidence from the experiments of Mokotoff and Ross with spinal anesthesia that there is no neurogenic component in the renal vasoconstriction and the high filtration fraction in chronic congestive failure.[5] No data is available on patients in acute cardiac failure

The question now arises as to the relationship between cardiac failure and the observed renal dysfunction. Is the reduced renal blood flow merely another consequence of general passive congestion and back pressure in the renal veins? There are several reasons why this cannot be the answer First, the changes in renal blood flow and glomerular filtration are, as Merrill and Mokotoff have shown independent of the level of venous pressure.[5 6] They persist even when the venous pressure is normal as the result of digital

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ization, mercurial diuresis, and other cardiac management Secondly, experimental renal venous congestion in normal man, produced by abdominal compression as in the careful experiments of the Bradleys, causes a much smaller disturbance in renal function than occurs in congestive failure [6] We must, therefore, conclude that the reduced renal blood flow and low glomerular filtration in congestive failure are primarily the result of poor cardiac output, a manifestation of forward failure Later, when venous hypertension develops and persists, it adds a further handicap to renal blood flow and function

The new concept, introduced by Warren and Stead in 1944, concerning the role of the kidney in the edema of cardiac failure, has helped to clear up the mystery of the nature of the salt or sodium retention, already well established, nearly fifty years ago by Achard, Widal, Strauss and their associates [7] It has also strengthened the evidence of Starr that venous hypertension involves much more than right heart failure, that it really results from venous engorgement or increased blood volume, and that it has a compensatory function in maintaining cardiac output [8] The increased plasma volume necessary to distend the veins and raise the pressure in them, we now know, is the result of renal retention of salt and water In this sense, forward failure, by causing the renal dysfunction in heart failure, is indirectly responsible for venous congestion or backward failure The keystone of the arch of heart failure is renal retention of sodium chloride It took a long time to recognize this idea because ordinary tests for renal function, including the urea clearance, were not sufficiently informative or accurate to demonstrate the basic renal dysfunction, first indicated by Seymour *et al* in 1942, the same year in which Schroeder and Futcher clearly dissociated salt and water excreting abilities in congestive heart failure and pointed to the kidneys as the site of the trouble [9 10] The emphasis on the kidneys, however, should not be misinterpreted to imply that Starling's concept of fluid exchange in cardiac edema is no longer valid or that venous and capillary pressures cannot be rapidly elevated by acute cardiac failure or by exercise in the chronic cardiac Under these circumstances pulmonary or peripheral edema readily develops The important fact is that even at bed rest, even when venous pressure is in the normal range, even when the body is free from visible edema or excess fluids, the patient in chronic cardiac failure has a reduced renal blood and glomerular filtration rate which, in themselves, predispose to continued retention of salt and ultimate development of gross edema and venous congestion

This circulatory involvement of the kidney in congestive failure has some very important effects A reduction of 33 per cent in glomerular filtration rate means that 33 per cent less salt is filtered When you remember that normally only 1 per cent of the filtered salt is excreted, that 99 per cent is reabsorbed or conserved for the body, you can appreciate what a tremendous attraction for filtered salt normal tubules possess Even the powerful diuretic, mercury, rarely reduces tubular salt reabsorption below 96 per cent Therefore, when filtration is cut 33 per cent, the tubules receive much less saline than they are accustomed to handling normally, and they find it all too easy to reabsorb practically all the salt, leaving next to nothing for excretion in the urine Since about 80 per cent of this reabsorption occurs in the proximal tubule and only 15 or 20 per cent in the distal tubule, and since ingestion of extra water has no effect on filtration but produces diuresis by inhibition of pituitary antidiuretic activity on the distal tubule, it becomes clear why water diuresis in heart failure carries out very little extra salt The salt has already been largely absorbed higher up than the site of water diuresis

The failure of renal salt excretion in congestive heart failure is, therefore, related intimately to normal tubular reaction to reduced glomerular filtration This is the same response in a more chronic form as the subacute response of renal tubules to subacute loss of salt from the body on the Kempner diet, or as the acute response of the tubules to the acute loss of salt in severe sweating, vomiting, or diarrhea, in short, in all conditions associated with reduction of extracellular fluid and plasma volume, often with low serum sodium and chloride levels, and regularly with a 30 to 40 per cent or even greater reduction in glomerular filtration rate, the last just as in chronic heart failure [11] In all these conditions, except heart failure, the tubule behaves as it should, it reabsorbs practically all the diminished salt filtered, thereby benefiting the organism by preventing further loss of badly needed extracellular electrolytes Unfortunately, in heart failure, there develops not a shortage but a plethora of extracellular fluids as a result of this behavior of the kidney The tubules do not know that the reduced filtration is not really part of a circulatory shock due to low plasma volume They do not know that the plasma volume is increased, because, ordinarily, increased plasma volume is associated with increased cardiac output and increased glomerular filtration They react merely to the low volume of glomerular filtrate and as long as renal blood flow and filtration remain low, salt will be retained by the kidney even though the body bursts its seams with edema

There is no evidence as yet to substantiate the belief of some investigators that excessive activity

of salt- and water-retaining hormones is to blame for the behavior of the renal tubules in heart failure. If this should turn out to be the case, it will probably not be a finding peculiar to congestive failure but the identical mechanism set in motion in all other forms of acute and subacute salt dehydration and reduced renal circulation A reduced or inadequate cardiac output, an expression of forward circulatory failure, will probably also be found in all these situations

You may ask now "Why is it that in other conditions associated with low glomerular filtration rates, such as Simmond's disease or panhypopituitarism, Addison's disease, hypertensive renal vascular disease of long duration, and various cachectic states, one does not find edema as in heart failure?" The answer is twofold

(1) The tubules can be shown to be structurally damaged or functionally disturbed in these conditions so that they can no longer reabsorb salt as well as normal tubules Therefore there is no edema and, in fact, even dangerous loss of salt as in Addison's disease.

(2) Many of the conditions listed are associated with anorexia and weight loss due to poor intake of food Thus frequently entails a sharply reduced intake of salt Even a cardiac patient who has normal tubules may be kept edema free on a low salt diet Adding extra salt to the diet would soon bring out the true state of affairs You are all familiar with the ease with which edema is produced by parenteral saline in cachectic people, even when their plasma proteins are not too low Similarly, edema can be readily produced by a high caloric, normal salt-containing diet given to a concentration camp victim especially if he is allowed to be up and around, whereby his glomerular filtration rate is kept low much of the day [12] These so-called exceptions to the rule that low glomerular filtration predisposes to salt retention really help to strengthen the case for the theory

Please remember that there are numerous factors in cardiac edema as in renal edema and that the ultimate result stems from a dynamic algebraic equation in which plus and minus factors can cancel each other out Thus removal of salt from the diet, if rigid enough, may cancel out a low plasma albumin. Bed rest may cancel out increased venous pressure in the legs Motion of the arms with improvement of lymphatic drainage may cancel out both low plasma albumin and increased venous pressure in production of edema and digitalis and aminophyllin may cancel out renal retention of salt by increasing cardiac output and glomerular filtration [13] At any one moment many items must be taken into account in figuring the reason for the presence or absence of edema. We must beware of oversimplification but for clear thinking we must tackle one factor at a time The renal factor in heart failure is itself a complex of problems, but, fortunately, it lends itself to quantitative analysis

What does this analysis of the role of renal dysfunction in congestive failure teach us concerning the therapeutic control of the disturbance? First it teaches us that we must make every scientific effort to break the vicious cardiorenal cycle by improving the cardiac efficiency so as to increase the cardiac output and restore a more normal renal blood supply This means rest digitalis, oxygen, purine diuretics, and other accepted measures for treating a weakened myocardium and at the same time increasing glomerular filtration.

Second, the dictates of common sense teach us that when the excretion of salt is seriously impaired, the least we can do is to educate our patients to get along without it, especially when much good and no harm can result from dietary restriction of sodium in most patients This is particularly necessary because chronic cardiac insufficiency may go on for decades, because next to malnutrition and parasitic infestation, cardiac failure is the most important health problem in the world, because all other management of cardiac edema, including the regular and frequent use of mercurial diuretics is finally unsatisfactory unless a low salt diet is followed The enthusiasm which has greeted the revival of this classic therapeutic method in the last five years is an eloquent tribute to its effectiveness as well as a sad commentary on the neglect of a rational therapy for several decades The physicians who are interested in the best treatment of chronic heart failure will have to exert pressure in their respective communities including the hospitals, for the provision of salt-free bread, unsalted butter or unsalted oleomargarine, unsalted canned vegetables and salt-free milk preparations Only after this has been accomplished is it worthwhile investigating the merits of salt substitutes Remember diabetes—the prescription of saccharin is not the major emphasis in the training of diabetic patients although it is the easiest and sweetest part of the ritual

Third, restriction of fluids is unnecessary illogical, and often harmful in cardiac failure.[14 15] It has nothing to do with restriction of salt, a low fluid intake cannot counteract an excessive salt intake In fact, if the diet is low enough in salt extra fluids may increase sodium excretion somewhat because the kidney cannot reabsorb salt perfectly [16] But forcing of fluids to the point where the patient must drink all day in order to urinate all night is not exactly helpful to a tired heart a congested gastrointestinal tract, or a barbiturated psyche.

Fourth, in all but the very mild cases of chronic heart failure, the osmotic diuretics, such as urea or potassium salts, are not sufficiently effective nor sufficiently tolerated by the gastrointestinal tract to warrant their extended use Similarly, the oral administration of purine preparations, some of which actually contain sodium, is often of doubtful value because of a deleterious effect on the appetite It is, therefore, necessary to rely heavily on the organic mercurial diuretics since they act directly by decreasing tubular reabsorption which allows a larger fraction of the reduced glomerular filtrate and its salt content to escape into the urine The degree of response will vary with the amount of edema present, the state of the circulation in general and in the kidney in particular, the dosage of mercury, the auxiliary effect of acid-forming drugs, like ammonium chloride or nitrate, and the functional state of the renal tubules On low-salt regimes the diuretic response to mercury will naturally be less after the major part of the edema has been swept out than on more liberal diets This does not mean that the patient is better off on a higher salt intake It simply means that it takes much longer to accumulate a certain amount of fluid on 1 5 Gm of salt a day than on 3 or 4 Gm Therefore, less frequent use of mercurials is indicated on a good salt-poor diet Violent fluctuations in weight, edema, diuresis, and dehydration are thereby avoided

There are, however, instances of severe congestive heart failure in which, in spite of all appropriate therapeutic measures, diuresis and mobilization of edema are very difficult to achieve These patients are resistant to mercury and are exposed to the danger of increase of dosage to the point where mercury intoxication may occur Apparently, in these cases, one reason for failure to respond to ordinary amounts of mercury is an extremely low glomerular filtration of salt Under these circumstances even the partial inhibition by mercury of proximal tubular reabsorption does not suffice to provide more sodium than the distal tubule can normally reabsorb [16] Therefore, very little extra salt appears in the urine Here, again, the only real remedy lies in improving the general circulation and the renal blood supply and glomerular filtration rate This, unfortunately, is often impossible in the advanced stages of congestive failure

The fifth and final therapeutic lesson derived from our analysis of the role of renal dysfunction in congestive failure teaches us that there is a method of relieving the patient of extensive edema even when his kidneys no longer respond to mercurials We take advantage of the necessity of removing ascitic fluid by carrying out peritoneal dialysis with the instillation of several liters of 5 per cent glucose solution [17] After equilibration for two or three hours, this fluid contains almost as much salt, per liter, as the plasma, and its removal acts like a good mercurial diuresis except that the salt and the water of the edema fluid leave the body separately instead of together This is of very little consequence even though the interval is about twenty-four to forty-eight hours The patients to be treated in this manner must be carefully selected to avoid unpleasant consequences from respiratory or circulatory embarrassment, but the results may be very gratifying

To summarize this discussion, the normal circulatory relationship between the heart and the kidneys has been analyzed and used as a basis for comparison with the disturbed situation in congestive heart failure Cardiac renal dysfunction has been shown to affect glomerulotubular balance in such a way as to favor retention of salt by the normally reabsorbing renal tubule when presented with a less than normal amount of glomerular filtrate This renal retention of salt is a key factor in producing some of the important signs and symptoms of congestive heart failure Our increased knowledge of the mechanism of cardiac renal dysfunction has served to rationalize our therapeutic efforts Among these, most important are restoration of myocardial efficiency, restriction of salt in the diet, permission of normal intake of fluids, judicious use of mercurial diuretics, and, in the nonresponsive advanced stage of congestive failure, resort to extrarenal or peritoneal removal of salt

References

1 Smith, H W Lectures on the Kidney, Porter Lectures, Series 9, Lawrence, Kansas University of Kansas (1943)
2 Lauson H D Bradley S E and Cournand, A. J Clin. Investigation 23 381 (1944)
3 Merrill, A J J Clin Investigation 25 389 (1946)
4. Shorr E., Zweifach, B W Furchgott, R. F, and Baer, S Tr A Am. Physicians 60 28 (1947)
5 Mokotoff R. and Ross G J Clin. Investigation 27 335 (1948)
6 Bradley, S E and Bradley, G P J Clin Investigation 26 1010 (1947)
7 Warren J V and Stead E A Jr Arch. Int. Med. 73 138 (1944)
8 Starr I Am. J M Sc 199 40 (1940)
9 Seymour, W B, Pritchard W H. Lougley L. P and Hayman, J M Jr J Clin. Investigation 21 229 (1942)
10 Futcher P H, and Schroeder, H. A. Am. J M Sc. 204 52 (1942)
11 Weston R. E, Hellman L, and Escher D J W Federation Proc 7 132 (1948)
12 Denz, F A. Quart. J Med 16 1 (1947)
13 Weston R. E, and Escher D J W J Clin. Investigation 27 In press (1948)
14 Schemm, F R. Ann Int Med 17 952 (1942)
15 *Ibid* 21 937 (1944)
16 Gorham, L. W Lester, D E, Wolf, A V, and Shultz, H H. Ann. Int. Med 27 575 (1947)
17 Cherkasky, M, and Hellman, L To be published.

FETAL DEFECTS RESULTING FROM ILLNESSES OF THE PREGNANT MOTHER WITH SPECIAL REFERENCE TO VIRUS DISEASES

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IN 1941 there appeared in the *Transactions of the Ophthalmological Society of Australia* an article by an oculist, N Gregg entitled "Congenital Cataract Following German Measles in the Mother "[1] The observations recorded in Gregg's paper were so astonishing that they quickly found their way into medical literature all over the world Swan and his collaborators, also in Australia, corroborated the previous findings and reported a number of new cases.[2-4] What amazed physicians everywhere was that rubella, heretofore considered so innocuous and medically so uninteresting, should suddenly become a disease of very great importance From the data obtained in Australia and later confirmed here in the United States, it became clear that in the case of rubella, when the mother became infected during the early months of pregnancy, congenital defects of the fetus were the rule In April, 1946 I reported a summary of our knowledge of this subject before the American Academy of Pediatrics in New York City and was able to collect about 200 cases from the literature, to which I added six new cases Many more cases have been reported since that time.

The findings in the case of rubella are of great importance, not only because they furnish us with a definite causative factor for certain congenital anomalies, but also because they prove so well that congenital defects may be the result of maternal disease acquired after conception has taken place The findings have also led to greater interest in the relationship of disease in pregnant woman to fetal defects, and recent medical literature contains much on this subject

The most fundamental of the recent studies of congenital defects are those of Warkany[5-7] In his work on rats he was able to show that defects may be induced at will by exposing the mothers to certain deleterious influences during pregnancy Even changes in the mother's diet may be responsible for abnormal offspring For example, if the mother rat was kept on a diet deficient in vitamin A, a constant ocular defect, consisting of a fibrous retrolenticular membrane in place of the vitreous, was found in the offspring When the mother's diet was again supplemented with vitamin A, pregnancy resulted in normal offspring Similar experiments were carried on with the use of diets deficient in other vitamins which resulted in the appearance of other types of defects.

It is of interest that similar defects may be obtained in the offspring by harming the pregnant mother in an entirely different manner, as, for example, by exposure to x rays[6] Warkany points out and emphasizes that, etiologically congenital defects fall into two main groups those which are genetically determined, namely those where the fault lies in the genes themselves and, second, those resulting from adverse conditions affecting the developing ovum These latter may be dietetic, infectious, or actinic in origin. Of considerable importance is the fact that the same defect may arise as the result of either abnormal genes or injury to the developing fetus. Warkany gives the occurrence of cleft palate in a certain breed of mice, a condition which recurs owing to a genetic defect, as an example. However, in normal mice this same anomaly, cleft palate, may be produced by radiation of the pregnant mother or in other mice by a diet deficient in riboflavin Another example is human microcephaly, which in one instance is due to a genetic defect with several affected members in the family, in another instance follows infection of the mother with toxoplasmosis and in a third results from irradiation of the mother during the second and third months of pregnancy

We shall presently see that not only different abnormal conditions may give rise to the same congenital abnormality but that certain noxious influences constantly give rise to a particular group of defects. Such for example are the anomalies following maternal rubella Other virus infections of the mother may also lead to abnormal offspring It is of interest, therefore, before taking up the subject of rubella to review the general subject of virus transmission from the mother to the fetus.

The role of the placenta as a barrier between the mother and the fetus has long been a subject of much discussion. It is now fairly well established that the intact placenta does not permit the passage of micro-organisms from the maternal to the fetal circulation but that this only can occur when there is present some pathologic condition of the placenta itself Particles infinitely smaller

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than bacteria, however, are certainly able to cross the barrier even when the placenta is healthy Take, for example, immune bodies These substances, antitoxins, precipitins, bacteriolysins, and complement fixing antibodies have been shown to occur quite regularly in the fetus Diphtheria antitoxin appears in the newborn infant in the same titer as it is present in the mother's blood, a fact demonstrated by Ratner and others [9]

The cord blood contains antibodies for scarlet fever toxin, as Toomey's results proved when he demonstrated the fact that serum from cord blood would in many cases blanche a scarlet fever rash when used intradermally in the Schultz-Carlton test and that it would also at times neutralize Dick toxin [10] This ability of the fetus to receive immunity from the mother has been used clinically by investigators to protect the newborn infant against disease Cohen and Scadron injected mothers with pertussis vaccine and were able to show immunity to whooping cough in the infants [11] Tetanus antitoxin has also been shown to appear in the infants, blood when the mother has been immunized This was proved especially useful in Africa where tetanus neonatorum was a common disease It is of interest to note that it has been shown by Bryce and Burnet that the placenta becomes less permeable for maternal antibodies during the later months of pregnancy [12]

That bacteria cross the placenta is borne out by the occurrence of congenital syphilis There are cases in the literature where the mother is suffering from gonorrhea, and the newborn infant has gonorrheal arthritis Pneumonia of the newborn is a not uncommon finding

Since our knowledge of erythroblastosis has advanced so fast during the past decade, we have come to realize that it must be not too rare for a product of the red cell to pass from the fetal to the maternal circulation, for it is by this means that the mother gradually becomes sensitized to her infant's blood type Another link in the chain of evidence is the occasional occurrence of protozoan diseases in both mother and infant

Some years ago I reported a case of congenital malaria in an infant, born in New York City in midwinter, who developed severe anemia found to be due to an overwhelming infection with tertian malaria [13] The mother had had untreated chills and fever during pregnancy and plasmodia were also found in her blood Cases are on record where plasmodia have been found in the cord blood

We know then that, occasionally, large particles like bacteria or plasmodia cross from mother to fetus and that much smaller bodies like antibodies also traverse the barrier It is not surprising then that viruses which probably lie midway in size between these two are also able to pass from the mother's circulation to that of her offspring Measles is a case in point A mother ill with the disease may give birth to an infant with the illness, or the disease may appear in the newborn child within a week of birth, showing by the brevity of the incubation period that the infection must have been intrauterine I saw such a case where the mother had just recovered from measles and the infant developed the rash on the seventh day of life

There are a few cases of varicella reported occurring under the same circumstances [14 15] One reported in 1939 appeared in the infant on the second day of life Smallpox and vaccinia are also transmissible to the fetus as is influenza In the last named, lesions typical of the disease have been found in the dead fetus Rabies has been inoculated into dogs from the brain of a fetus whose mother had died of the disease The animals developed rabies

Viral diseases affecting the nervous system are of special interest as regards their transmissibility Many of the encephalitides, such as lymphocytic choriomeningitis, pass from mother to fetus with ease In animal experiments the young have been shown to have acquired the disease while in the uterus, their brains have shown typical lesions, and the virus has been recovered from them In this particular connection the question of the infectivity of poliomyelitis is of considerable interest Since encephalitis is so easily transmitted, one would suppose that the virus of infantile paralysis would follow the same course Such, however, is not the case There have been no cases reported where women stricken with anterior poliomyelitis during pregnancy have transmitted the disease to their offspring Aycock and Ingalls do not agree with this and report fetal disease resulting from poliomyelitis [16] They mention three cases of maternal poliomyelitis contracted during the ninth month of pregnancy in which the infants were said to have the disease, but no details are given Harmon and Hoyne have reviewed this subject and say that "pregnancy has little, if any, influence on the course of poliomyelitis in a paralyzed mother, and, conversely, that in utero infection of the fetus occurs with rarity, if at all" [17] They quote the work of Brahdy and Lenarsky and of Kleinberg and Horowitz, all of whom agree that there is almost no chance of fetal damage due to poliomyelitis A few cases have died as the result of prematurity In one of Hoyne's cases the mother had bulbar symptoms, and the fetus died as the result of asphyxia The spinal cord was obtained, but no virus could be demonstrated in it by means of inoculation into monkeys The reason for this failure of the fetus to become infected is most

probably explained by the fact that the virus of poliomyelitis is not found in the cerebrospinal fluid nor in the blood stream and that, therefore, it has no way of getting into the placental circulation.

From the results obtained in the laboratory one should expect to find virus infections of the fetus to be very common occurrences because there are many findings which point to the fact that young, undifferentiated tissue is particularly susceptible to virus disease. For example, it has been shown that the viruses of vesicular stomatitis and equine encephalomyelitis can be cultivated in a medium of chick embryo in Tyrode solution [18] However, the hatched chick, when only two days old, is resistant to these same viruses The influence of increasing age of the host on the infectibility of its tissues is also brought out by Sabin's experiments on mice [19] If an infant mouse is injected with certain viruses by the intramuscular route, encephalitis results. However, if the same virus is injected into adult animals, the virus fails to reach the nervous system This has been found to be due to the formation of barriers which develop in the nerve pathways by which the virus travels. If the virus is injected into the nerve of a young animal, it passes unopposed to the central nervous system and causes encephalitis. If injected into an adult, it is blocked by a barrier in the nerve However, if the virus is injected intracerebrally, it causes encephalitis in the adult as well as the young animal In the same way, the young mouse develops encephalitis after intraperitoneal injection of virus, whereas the adult mouse fails to do so Again, if virus is injected into the muscles of a young animal, it multiplies rapidly, in the adult it does not To quote Ohtsky, "young actively multiplying tissue is generally more responsive to many viruses and also to tumors. Also chick embryos are readily infected by many viruses in contrast to chicks after hatching which become insusceptible to the same inoculants One can conclude, therefore, that, with age, non-nervous tissue—the 'peripheral organism'—becomes increasingly resistant to virus."[20]

From results such as these, is it not remarkable that although virus infections are so common in adults and although as we have seen, they are able to traverse the placental barrier, we do not see more virus disease in the fetus?

So far in discussing the transmission of viral disease to the offspring, we have not mentioned permanent damage that may result therefrom. It is now commonly believed that many cases of congenital spastic disease and congenital cerebral defects so frequently encountered may well be the result of intrauterine fetal encephalitis.

Quite recently a piece of research has been published which is extremely pertinent to the subject and deserves a detailed description. I refer to the paper of Hamburger and Habel.[21] Struck by the fact that rubella virus causes "a specific pattern of localized malformations," they set out to study the effect of virus on the embryo by directly injecting it into the developing hen's egg They worked with influenza A and with mumps virus, and their results are most interesting If they injected the influenza virus very early in embryonic life, they always got the same group of malformations namely, microcephaly and micrencephaly, malformation of the amnion, and twisting of the embryo's axis Moreover they discovered that the virus was much more concentrated at the cephalic end of the embryo than elsewhere, regardless of the place where the virus was injected When the mumps virus was used, the results were different It failed to produce a definite group of malformations However, it raised the incidence of deformities occasionally occurring in chick embryos These are Hamburger's and Habel's conclusions

> Experimental evidence has been presented to show that influenza A virus (PR8) has teratogenetic effects on the early chick embryo It produces a specific syndrome, comprising microcephaly and micrencephaly twist of the axis, and impairment of growth of amnion. Furthermore the virus is lethal for early embryos within three days after infection. The mumps virus is also lethal for early embryos within five days after infection It does not produce specific abnormalities but seems to raise the incidence of malformations of the types which occur occasionally in uninfected chick embryos These results place influenza A virus in line with rubella virus as a teratogenetic agent. Furthermore our observations on influenza A infections in chick embryos confirm the observations on rubella in humans in that only infections of early embryos result in abnormalities. Chick embryos of four days incubation are killed by the influenza virus, but it seems that at this stage of development most organs have passed the critical period at which their morphogenesis can be directed into atypical channels. In this respect, it is of interest to find that the patterns of infectiousness are different for the embryo and for the fully developed structures In the embryo the brain tissues seem to be particularly susceptible to influenza A virus, whereas in the adult the respiratory mucous membranes are primarily affected In mumps the inflammation of the salivary glands is frequently combined with meningitis, but no effect on the brain was found macroscopically in embryos. The situation is the same as in rubella where the embryonic defects seem to have no obvious relations to the manifestations of rubella infections in older phases of life.[21]

At the present time we have in the case of rubella a classic unquestioned example of the

deleterious effect on the fetus of a viral disease in the mother The observations of Gregg and of Swan and their collaborators in Australia have been corroborated many times, especially by case reports here in the United States [22–34] We know that if rubella attacks the pregnant mother within the first trimester of pregnancy, the offspring may be permanently damaged and may show defects including cataract, deaf mutism, cardiac malformations, mental retardation, microcephaly, and hypospadias The infants are often underweight at birth and are difficult feeding problems

My own personal experience with this syndrome consists of seven cases In six of the seven cases the mother's infection occurred in the first trimester, in one case it occurred in the fourth month and the infant showed mental retardation, congenital cardiac disease, and bilateral cataracts All but one of the six cases were mentally retarded, all but one had defective eyes, four having congenital cataracts and two glaucoma, five of the mothers contracted rubella in and about New York City, one in London, England, and one in Biloxi, Mississippi

It is hard to believe that so striking a syndrome should have escaped the attention of clinicians all these years, and it seems more likely that there occurred in 1940 some change in the virus of rubella Gregg was able to report 78 cases of congenital cataract encountered in a short period of time in the vicinity of the city of Sydney Moreover, the type of cataract appeared to be different from those previously encountered By circularizing the pediatricians, ophthalmologists, and obstetricians of California in the fall of 1944, Prendergast was able to collect so large a series of these cases that he believes they are more prevalent on the west coast and that the disease may have been brought over from Australia and spread from California eastward through the United States [35] However, it has since been established that an epidemic of rubella in England in 1940 was productive of many cases of congenital defects

Many defective children are reported, but as yet we have not enough data to draw any conclusions as to the frequency of rubella in pregnancy followed by normal infants This can only be determined by careful statistics gathered from many parts of the country At the present time a nation-wide investigation is being conducted by the American Academy of Pediatrics whose committee has sent questionnaries to all of its members In March, 1948, the committee released the figures for 132 of the cases reported to them where the mother had rubella in the first trimester of pregnancy Seventy-six babies had congenital cataracts, 13 had other ocular defects including glaucoma and microphthalmia, 35 were partially or completely deaf, 68 had abnormalities of the brain, 67 had malformations of the heart, and 18 babies were found to be free of all defects Studies are also being carried on in large obstetric services where prospective mothers are now routinely questioned as to the occurrence of illness during pregnancy which might possibly be of viral origin

Another method of obtaining information is to go back in the histories of children in institutions caring for those afflicted with defects which we now associate with maternal rubella An interesting example of this method is the work of Clayton-Jones, who investigated the histories of children in schools for the deaf in England [36] In one school, the results, according to the author, were "startlingly positive" Of the 18 children in the school, a history of maternal rubella was obtained in eight A ninth was probable, and a tenth was possible In all the positive cases the disease occurred in the first four months of pregnancy All the cases were born between August 24 and October 26, 1940, while the birth dates of the other children were scattered between 1929 and 1941 In three other schools for the deaf, 8 9 per cent of the inmates were born of mothers who had rubella during pregnancy Clayton-Jones points out that the 1940 epidemic of rubella in England gave rise to many cases of deafness, and he suggests that this may be due to the fact that the disease seemed particularly prone to have attacked young adults It is of interest that the first case of a defective child which I saw in New York City in 1941 was born of a mother exposed to this same epidemic in London in her second month of pregnancy The infant, when I first saw it, had bilateral cataracts and congenital cardiac disease As the child grew older, it was apparent that he was also deaf and mute

Following this same plan of research, Green and Dogramaci investigated the records of 434 children suffering from congenital heart disease and found a history of maternal rubella in four cases and an exposure to rubella in one case [37]

Almost all the articles dealing with maternal rubella and fetal disease are case reports Three papers, however, have appeared which attempt to attack the problem from another angle The report of Fox and Bortin is one of these [38] These authors approach the subject from the public health viewpoint and attempt to find out how many mothers have had German measles during their pregnancies with resulting normal offspring They went back over the records of the Milwaukee Health Department and investigated the cases of rubella reported during the years 1942, 1943, and 1944 During this period there were 22,226 reported cases Of these, 581 were re-

ported as married women, and it was possible to investigate 152 of these Among these 152, eleven had rubella during pregnancy, five before the second month, four from the second to the fourth month, one in the seventh, and one in the ninth month. Of these 11 cases, only one showed congenital disease, a stillborn, hydrocephalic infant born of a mother who had rubella in her first month of pregnancy None of the other ten infants had congenital malformations It is important to note that these results were all determined from data obtained from health department records and that there was no certainty as to the correctness of the diagnosis of rubella, a difficult diagnosis, especially in the absence of an epidemic

These findings are certainly at variance with those of Swan, who found percentages varying between 50 and 100 per cent, depending on the stage of pregnancy when the mother took sick One might conjecture that the virus in Milwaukee might be of a different type, but two cases with deformities have been reported from that city by Greenthal.[39]

The second article which approaches this subject from the statistical angle is that of Conte McCammon, and Christie.[40] These authors collected cases reported to date and could find 134 in which maternal rubella in pregnancy was followed by congenital malformation of the fetus. They also reported finding 20 cases of maternal rubella without fetal defects In four of these, the rubella occurred in the third month of pregnancy, in the remaining 16 it occurred after the seventh month. Among their conclusions are these "Further evidence to support the fact that rubella in pregnancy is a predisposing cause of congenital malformation was suggested by a further survey of our records as follows Maternal rubella was noted in 4.2 per cent of the cases of congenital abnormalities surveyed. This exceeds by at least ten times the actual case rate of maternal rubella for the child bearing age group in the population at large."[40]

In Prendergast's series from California, there were ten mothers who had rubella in the first trimester but only six of the infants had congenital defects [41]

Aycock and Ingalls investigated 1 300 cases reported to Boards of Health of two Massachusetts communities and found four cases where rubella occurred during pregnancy, two in the second month, one in the fourth and one in the ninth month.[16] Of the four offspring only one was defective. They combine their figures with those of Fox and Bortin and as a result show that about 25 per cent of the children are affected when the disease occurs in the first trimester When these figures are compared with those of Gregg and of Swan, it is evident that they differ completely

With the rubella syndrome so definitely established as an entity, it is natural that other virus diseases affecting the pregnant mother should be investigated There are now recorded in the literature a number of instances in which fetal defects have followed maternal disease other than rubella Swan in 1946 reported six cases of mumps in the pregnant mother, two in the first month of pregnancy, one in the fourth, two in the fifth, and one in the seventh [41] Curiously enough, the infants in every one of the cases showed some congenital defect These included corneal opacities, congenital cardiac disease, mongolism, microcephaly, nevi, and imperforate anus

Swan also reports two cases of herpes zoster in the mother, one in the fourth month and one in the sixth month of pregnancy In both cases the fetus was defective one case showing deaf mutism, heart disease, and microcephaly, the second showing myelocele, bilateral talipes, and right genu recurvatum. In two cases of scarlet fever, normal infants were born Swan reports two cases of varicella both in the seventh month of pregnancy, one of the babies being abnormal. Eighteen cases of morbilli were followed, four of which resulted in abnormal infants with heart disease in one case and heart disease, pyloric stenosis, and genu valgum in another The remaining were all normal children

In summing up his findings Swan says

> With regard to the effect on the fetus of other infectious diseases during pregnancy there is little evidence as yet to suggest that morbilli leads to congenital abnormalities though it is possible that it may be a cause of abortion. The question whether mumps and other virus conditions may be followed by congenital malformations remains open. As far as mumps is concerned, a number of defects have been recorded, but so far no definite syndrome, such as that associated with rubella, has emerged If other viruses are found to play a part in the etiology of congenital anomalies, we postulate that they will be confined to those which circulate at some stage of the infection in the mother's blood stream. The available evidence suggests that maternal infection during pregnancy with strict neurotropes—for example, poliomyelitis—which are apparently confined to axonic pathways and do not invade the blood stream has no effect in the infant born subsequently

Last year, several cases of smallpox occurred in New York City and, as a result, about 5 000 000 persons were vaccinated With our knowledge of virus infections, the question at once arose as to whether pregnant women should be vaccinated The statistics of the vaccination campaign have been analyzed by Dr Morris Greenberg of the New

York City Department of Health In a careful follow-up of the infants born to mothers vaccinated in the first four months of pregnancy, compared with a control group of those born to unvaccinated mothers, he has definitely shown that vaccination is a safe procedure during the first four months of pregnancy so far as the occurrence of congenital defects in the offspring is concerned [42]

Now that the knowledge that virus diseases may affect the embryo is well established, what can be done to prevent fetal damage? First, pregnant women, especially in their first trimester, should be warned to avoid contact with others suffering from such diseases Secondly, girls should be purposely exposed to rubella as one attack usually protects Third, the value of gamma globulin as a prophylactic agent for rubella must be investigated A study of this question is now in progress It is a complicated one and presents great difficulties, but it is felt that over a long period of time results may be obtained that will decide whether gamma globulin can be used for rubella as it is for measles If a large epidemic of rubella should occur, convalescent blood or globulin extracted therefrom might be obtained in sufficient quantity to test its efficacy

Mongolism has always been an intriguing problem for the geneticist, the endocrinologist, and the pediatrician. Although many theories have been advanced for its causation, none has proved satisfactory Recently, interest in this question has been revived by Ingalls of Boston [43] He was impressed by the fact that in Mongol children, many apparently unrelated congenital abnormalities may make their appearance He cites congenital heart defects, cataracts, polydactyly, darwinian tubercles, and malattachment of the mesentery If one accepts the concept that Mongolism is due to an endocrine disturbance, possibly pituitary disease, it is difficult to link this up with the occurrence of these defects One would have to suppose that the basic cause of Mongolism exerted its maximum effect at a particular period of gestation, for it is now commonly accepted that certain defects in the newborn infant occur only when the fetus is damaged at a definite period of fetal life Cataract results from damage in the sixth week, deafness from damage in the ninth week, cardiac anomalies from damage in the fifth to tenth week, and deformed teeth from damage in the sixth to ninth week

When one considers that ocular defects are not at all rare in Mongolian idiots and cardiac defects are found in 25 per cent or more, one cannot fail to be impressed by the similarity to the situation in the case of rubella Ingalls, therefore, believes that the question of maternal disease as a cause of Mongolism needs considerable investigation Davies and he reported seven cases of Mongolian infants whose mothers had the following illnesses during pregnancy influenza (second month), rubella (second month), mumps (second month), mastoiditis (second month), pleurisy (third month), grippe (sixth month), and purulent otitis media (second month) [44] Swan refers to four other cases, two observed by himself, one by Gregg, and one by Conte *et al*

Ingalls emphasizes the fact that cranial deformity, i e, brachycephaly and dwarfing of the tribasilar bone, is a constant feature in Mongolism and that it may be one of a series of other defects such as cardiac anomalies or changes in the bones of the hands, all of which together make up the clinical picture of the Mongol infant On this basis, he postulates that the condition of the mother during the first trimester of pregnancy may perhaps be responsible for Mongolism

I will mention briefly the important subject of the offspring of the diabetic mother The infant is, as a rule, markedly overweight and shows a tendency toward anatomic changes, especially cardiomegaly and excessive extramedullary erythropoiesis Neonatal mortality is high Until recently these findings have been attributed directly to the disturbance in the mother's carbohydrate metabolism

However, investigators, particularly H C Miller, have shown that diabetic women give birth to excessively heavy infants, even when these are born long before the onset of maternal diabetes [45] Even the cardiomegaly and extramedullary erythropoiesis have also been shown to occur in infants born prior to the onset of maternal diabetes It is also of interest that the frequency of congenital malformations has been noted to be high in children born of diabetic mothers

I have reviewed briefly some of the effects of disease of the pregnant mother on the offspring and have particularly stressed the role played by virus infections With the rapid development of virology, both in its clinical and laboratory aspects, there is certain to be a real advance in our knowledge of this subject To quote Warkany, "It is obvious that a better knowledge of the etiologic factors which lead to malformations will bring us nearer to the solution of the problem of prophylaxis"

References

1 Gregg, N McAlister Trans. Ophth. Soc Australia 3 35 (1941)
2 Swan, C, Tostevin A L Moore, B, Mayo H., and Black G H. Barham M J Australia 30 201 (1943)
3 Swan, C, Tostevin A L, Mayo H and Black, G H. Barham *Ibid* 31 409 (1944)
4 Swan C J Path. & Bact 56 289 (July) 1944
5 Warkany, Joseph Am. J Ment. Deficiency 50 231 (1945–1946)

6 Warkany, Joseph, and Schraffenberger E. Arch. Ophth. 35: 160 (1946)
7 Warkany Joseph Advances in Pediatrics New York, Interscience Publishers 1947
8. Goldstein L., and Murphy D P: Am. J Roentgenol 22: 822 (Oct.) 1929
9. Kuttner A., and Ratner B.: Am. J Dis. Child. 25: 413 (1923)
10. Toomey J A. and August, M H.: *Ibid.* 38: 953 (1929)
11 Ooben P and Scadron S. J: J Pediat. 29: 609 (1946)
12 Bryce L. B. and Burnet F M: J Path. & Bact. 35: 183 (1932)
13. Bass M H. Arch. Pediat. 31: 251 (1914)
14. Campbell Eugene P: Am. J Dis. Child 57: 1408 (1939)
15. Lucchesi P F LaBoccetta A. C. and Peale A R: *Ibid.* 73: 44 (1947)
16. Aycock, W L. and Ingalls T H. Am. J M Sc 212: 360 (1946)
17 Harmon, Paul H. and Hoyne Archibald: J.A.M.A. 123: 185 (1943)
18. Olitsky, P K. Cox, Herald R. and Sylverton, J T J Exper Med. 59: 189 (1934)
19 Sabin, Albert B.: J Pediat. 19: 596 (1941)
20. Olitsky P K., and Casals, J: Bull New York Acad Med. 21: 356 (1945)
21 Hamburger, V., and Habel K. Proc. Soc. Exper Biol & Med. 66: 608 (1947)
22. Reese A. B.: Am. J. Ophth. 27: 483 (1944)
23. Erickson, C. A.: J Pediat. 25: 281 (1944)
24. Perera C. A.: Am. J Ophth. 28: 186 (1945)
25. de Roetth, A F M. and Greene P B Northwest Med. 44: 222 (1945)
26. Hones Benjamin: M Ann. District of Columbia 13: 285 (1944)
27 Albaugh C. H.: J.A.M.A 129: 719 (1946)
28. Altmann F and Dingmann A: Arch. Otolaryng 42: 51 (1945)
29 Guerry, D: Am J Ophth. 29: 190 (1946)
30. Gear E. L. and Potts, C R.: Am. J Ophth 29: 586 (1946)
31 Adams, F H.: Journal Lancet 65: 197 (1945)
32 Long J O. and Danielson, R. W: Arch. Ophth 34: 24 (1945)
33. Carruthers, D G: M J Australia 32: 315 (1945)
34. Hass, M H and Nothman G: J Mt. Sinai Hosp. 12 60 (1945)
35. Prendergast J J: Arch. Ophth. 35: 39 (1946)
36 Clayton-Jones E.: Lancet 1: 56 (1947)
37 Green H. and Dogramaci L: J Pediat. 30: 295 (1947)
38. Fox M. J and Bortin M. M.: J A M A. 130: 568 (1946)
39 Greenthal, R. Arch. Pediat. 62: 53 (1945)
40. Conte, W R. McCammon C. S. and Christie A: Am. J Dis. Child. 70: 301 (1945)
41 Swan, C., Tostevin, A. L. and Black G H. Barham: M J Australia 2: 889 (1946)
42. Greenberg, Morris Personal communication
43 Ingalls, Theodore H Am. J Dis. Child. 73: 279 (1947)
44 Ingalls, Theodore H. and Davies John A. V: New England J Med 236 437 (1947)
45. Miller H. C: J Pediat. 29: 455 (1946)

PABA USED AS PROTECTION AGAINST SUNBURN

Protection from sunburn is achieved by para aminobenzoic acid ointment. PABA has greater ultraviolet absorptive power than salicylic acid. A 15 per cent concentration in Ruggles' cream, applied before exposure, prevents even highly sensitive skin from burning in intense sunlight or under irradiation of mercury arc lamps. None of the 32 subjects observed by Stephen Rothman, M.D, and A. B Henningsen M.D of the University of Chicago, had previously been able to remain long in the sunshine without harmful effects. No sunburn occurred when PABA was used

OUR MENTAL "ACHING BACK"

'Oh, my aching back, GI Joe's favorite and most symbolic slang phrase during the war, applies to the whole world now and will for some time to come.

So declares Dr William C Menninger, general secretary of the Menninger Foundation and chief consultant in neuropsychiatry to the Surgeon General of the Army 1943–1946

A kind of prescription for warding off "the aching back' in these days of heavy world and personal burdens and stresses is to be found in Dr Menninger's new book *Psychiatry in a Troubled World* (Macmillan) Dr Menninger refers to the mental and emotional troubles, rather than a physical backache

Drawing on his war experiences with the millions of "Joe's and Mary's from Brooklyn and Kokomo' who made up our huge war machine, he gives nine factors which helped the Joe s and Mary's stay normal in spite of war's stress and strain These same nine he believes, will help each of us meet our aching back problems in civilian life.

They are

1 Recognition of the existence of a struggle between the personality and the environment.

2 A job with a purpose

3. Teamwork. Working with a group helps the worker as well as the group is good for mental health

4 Leadership This works both ways too. Most of us have to work under someone but most of us also are leaders at times either as parents teachers, foremen, or presidents of clubs.

5 Intellectual growth, getting new ideas, learning new things.

6. Promotion, for the individual and for the family the neighborhood, the city the state and the nation.

7 Recreation

8 Religion. Like most psychiatrists Dr Menninger believes there is no antagonism between religion and psychiatry

9 Now awareness of emotional conflicts, of the occurrence of 'operational fatigue in civilian as well as military life

SIGNIFICANCE OF CHOLESTEROL IN CORONARY ARTERIOSCLEROSIS

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CORONARY arteriosclerosis with its complications is the greatest single cause of death in this country today, as revealed by recent mortality statistics [1] Of the 3,040 physicians who died in the United States in 1947, approximately one out of three died of coronary arteriosclerosis [2] This problem merits far greater and more intensive investigation than it is now receiving

Progress in the study of arteriosclerosis in general has been greatly hampered by two erroneous clinical concepts the first that all types of arteriosclerosis are part of the same pathologic conditions, and second, that intimal arteriosclerosis is an inevitable consequence of aging

There are two separate and distinct processes included in the term arteriosclerosis, intimal arteriosclerosis and medial or Mönckeberg's sclerosis Intimal arteriosclerosis is of great importance because it results in reduction of blood flow to vital areas, such as the heart, brain, and extremities, and leads to clinical syndromes of coronary insufficiency and thrombosis, cerebral thrombosis, intermittent claudication, and gangrene of the extremities Intimal arteriosclerosis consists of irregular plaque formation which protrudes into the lumen of arteries On microscopic examination, the lesions consist of lipoid depositions beneath the endothelium of the intima, followed by the appearance of foam cells, fibrosis, hyalinization, necrosis, and calcification

Medial arteriosclerosis or Mönckeberg's sclerosis is limited for the most part to the media of the peripheral arteries and is characterized by medial degeneration, fibrosis, and calcification This type of lesion does not cause a reduction of blood flow and does not lead to any serious accidents but merely results in a loss of elasticity, dilatation, tortuosity, and increased rigidity of the vessel wall It is this type of arteriosclerosis which results in stiffness of the radial arteries that we clinicians so frequently palpate and erroneously conclude is indicative of intimal arteriosclerosis

Mönckeberg in his original description of medial sclerosis has emphasized that it is a separate process which cannot be correlated with the presence or absence of intimal arteriosclerosis [3] Sappington and Cook have more recently reached this same conclusion by examination of the radial arteries, coronary arteries, and aortas in the same individuals [4] For the purpose of this discussion, we can dismiss medial sclerosis from our consideration, and all further reference to the term arteriosclerosis is to include only intimal arteriosclerosis

There are some investigators who feel that intimal arteriosclerosis is an inevitable consequence of the aging process and that further study of this condition will not be fruitful However, there are many observations which indicate that such is not the case As more data become available, the occurrence of intimal arteriosclerosis in infants and children is not an uncommon finding Moreover, postmortem examination in elderly people reveals little or no arteriosclerosis at times In a postmortem study of 76 patients, age one through thirty-nine, dying of chronic nephritis, it was found that 96 per cent had intimal arteriosclerosis [5] In a recent report from the Army Pathology Department, 400 instances of coronary thrombosis were recorded in soldiers from the ages of nineteen to thirty-nine [6] Certainly these individuals did not succumb to senility The fatalistic attitude regarding arteriosclerosis has greatly retarded progress in the study of this disease

Numerous theories have been advanced to explain the cause of arteriosclerosis The one which seems to have the greatest experimental as well as clinical support has to do with cholesterol and abnormalities in its metabolism The emphasis on the significance of cholesterol in the development of arteriosclerosis results from three important observations (1) Windaus in 1910 showed by chemical analysis that the arteriosclerotic plaque is made up in large part of cholesterol and cholesterol esters, (2) Anitschkoff in 1913 produced lesions in rabbits similar to human arteriosclerosis by cholesterol feeding, and (3) certain disease states that result in premature, widespread arteriosclerosis, namely, poorly controlled diabetes, chronic nephritis, myxedema, and xanthomatosis, frequently show an elevated serum cholesterol [7 8]

Experimental Arteriosclerosis

Because arteriosclerosis cannot be adequately diagnosed and followed clinically, progress in the

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study of this process is largely dependent upon the reproduction of the disease in experimental animals. The arteriosclerosis in rabbits following a high cholesterol diet is similar in many respects to human arteriosclerosis The development of the lesions in the experimental animal and in man is analogous both microscopically and grossly Chemical analysis of the plaques in the rabbit and humans give comparable results However, Duff and other investigators have emphasized three important objections to comparing the experimental lesions to those in humans (1) the distribution of the lesions of rabbits differs from that occurring in man, (2) the morphologic appearance of the lesions in rabbits resembles the early stages of arteriosclerosis in humans, but the more advanced type of lesions do not develop, and (3) cholesterol feeding does not result in significant hypercholesterolemia and arterial lesions in omnivorous animals such as the dog, cat rat, or monkey, whose diet normally contains cholesterol [9]

However, in a recent report from this laboratory, it was demonstrated that arteriosclerotic lesions in dogs similar in distribution and morphologic characteristics to human arteriosclerosis resulted from prolonged hypercholesterolemia.[10] The high serum cholesterol values were produced by the feeding of 10 Gm. of cholesterol daily to dogs whose thyroid function was modified by thiouracil administration

After the initiation of high cholesterol diet, the serum cholesterol levels of the dogs increased from control values of approximately 150 mg to an average of 400 to 450 mg When 0.8 to 1.2 Gm. of thiouracil was added to the high cholesterol regimen, the serum cholesterol values further increased to average approximately 1,100 to 1,200 mg Postmortem examination was performed on the dogs on the high cholesterol diet with and without thiouracil from twelve to sixteen months after the onset of the experiment. Fine elevated yellowish streaks were grossly visible in the abdominal aortas of the dogs on the high cholesterol diet without thiouracil Microscopic examination of the lesions revealed lipoid depositions beneath the intima, forming an early arteriosclerotic plaque.

Autopsy examination of the dogs on the high cholesterol-thiouracil regimen revealed extensive generalized arteriosclerosis. The lesions varied from small pinpoint, yellowish white elevated lesions to large coalescing plaques The process was most marked in the abdominal aorta and its branches There were extensive lesions in the iliac arteries, and the process extended down to the tibial arteries

The coronary arteries were diffusely involved with resulting narrowing of the lumen. A few plaques were grossly seen on the anterior leaflets of the mitral valve, as well as in the sinus of Valsalva. The arteries forming the circle of Willis contained scattered plaques

Microscopic examination of the lesions revealed foam-cell infiltration, thickening of the intima, and narrowing of the lumen, together with fibrous hyalinization, distortion or rupture of the internal elastic lamella, and calcification In addition, areas of hemorrhage into the wall of some of the arteriosclerotic plaques occurred

Animals fed thiouracil without cholesterol were free of arterial lesions

The arteriosclerosis produced in dogs meets the objections raised concerning the comparison of arteriosclesosis in rabbits to that in men. The distribution of the lesions in dogs is similar to that occurring in humans Cerebral and renal arteriosclerosis is part of the generalized arteriosclerosis of dogs as well as of man On microscopic examination, advanced as well as early stages of arteriosclerotic process were present

In summary, arteriosclerosis in young dogs similar to human arteriosclerosis has been produced by the feeding of cholesterol and thiouracil

Now that an acceptable laboratory tool is available studies are in progress to prevent or reverse the experimental arteriosclerosis Choline is one of the substances under investigation Since Best and his coworkers demonstrated that choline and its derivatives were effective in preventing or relieving "fatty" livers of rats on diets rich in fat or cholesterol the action of choline on experimental arteriosclerosis has been tested in our laboratory [11] Preliminary reports indicated that choline was effective in preventing arteriosclerosis in cholesterol-fed rabbits for a limited period, and, in addition, in some instances caused a reabsorption of the previously induced arteriosclerotic lesions.[12 13] A further study on the effect of choline on the prevention of experimental arteriosclerosis extended these observations. Kesten and Silberwitz and Andrews and Broun have also confirmed our original observations in the rabbit [14,15]

Serum Cholesterol Studies in Coronary Arteriosclerosis

Because of the significance of cholesterol in experimental arteriosclerosis and because of the finding of an elevated serum cholesterol in various diseases, such as poorly controlled diabetes, myxedema, chronic nephritis and xanthomatosis, that have premature and widespread arteriosclerosis, it was thought desirable to review the status of serum cholesterol in patients with coronary arteriosclerosis The literature on this subject is not conclusive. Several reports record an elevation of serum cholesterol while others do not.

The diagnosis of arteriosclerosis in many instances consisted of palpation of the radial arteries, evidence which proves the presence of medial sclerosis but is not indicative of intimal arteriosclerosis

However, before considering the question of serum cholesterol in coronary arteriosclerosis, it is desirable to comment on the normal serum cholesterol The range of serum cholesterol values in normal subjects is wide, depending on the chemical method employed Two technics most widely used are those of Bloor, in which the range of normal cholesterol varies from 175 to 300 mg per 100 cc , and the method of Schonheimer and Sperry, in which the range varies from 150 to 275 mg per 100 cc [16 17] The method of Schonheimer and Sperry is considered to be more accurate, although it is technically difficult and requires considerable facility before reproducible results are obtainable The ratio of ester to free cholesterol is constant, approximately 3 to 1 In a study with Dr K B Turner, it was demonstrated that in a group of relatively normal persons, the individual serum cholesterol remains quite constant from hour to hour, day to day, and month to month [18] During the period of a year's study, the deviation from the mean cholesterol for each patient was less than 10 per cent

As recently reported, frequently consecutive determinations of serum cholesterol for periods up to two years were made in 15 patients with coronary arteriosclerosis and in 15 relatively normal individuals [19] Thirteen of 15 patients with coronary arteriosclerosis had had a well-documented coronary thrombosis The remaining two individuals had typical angina pectoris with a positive anoxemia test for coronary insufficiency [20] The patients were not included in this study until at least six weeks had elapsed since the onset of the myocardial infarction A total of 914 serum cholesterol determinations were made, 572 on the patients with coronary arteriosclerosis and 342 in the normal individuals

The average serum cholesterol values for each of the relatively normal individuals varied from 214 to 334 mg , with a mean average of 254 mg for the group The fluctuations of the serum cholesterol, as measured by the standard deviation for the normal subjects, averaged 8 7

In contrast, the average serum cholesterol of the patients with coronary arteriosclerosis varied from 308 to 499 mg , with a mean for the group of 355 mg , 100 mg greater than the mean of the normal subjects In addition, the average standard deviation for the patients was 24 8, three times as great as the average standard deviation of the normal subjects

Although statistically these results are significant, it was felt desirable to have serum cholesterol determinations on a larger group of patients For this reason, a single serum cholesterol determination was made on 50 additional patients with coronary arteriosclerosis and on 50 additional normal persons of the same age group The average serum cholesterol value for the second group of patients with coronary arteriosclerosis was 336 mg , in contrast to 236 mg for the control subjects These results confirmed the previous observations

Since these studies have been reported, Lerman and White found that 22 of 28 patients with coronary arteriosclerosis under the age of forty had an elevation of the serum cholesterol [21] Boas has also reported that an elevated serum cholesterol is a frequent finding in patients with coronary arteriosclerosis [22]

In summary, the serum cholesterol level of patients with overt coronary arteriosclerosis is significantly higher than the serum cholesterol level in normal subjects in the same age groups In addition, the serum cholesterol level of patients with coronary sclerosis fluctuates widely

Effect of Diet on Serum Cholesterol

Leary and, more recently, Dock have advocated the restriction of dietary cholesterol so as to prevent or retard the development of arteriosclerosis [23 24] The evidence on which this suggestion is based relies chiefly on the experimental arteriosclerosis produced by excess feeding of cholesterol to rabbits, chickens, and dogs However, there are, in addition, other data which tend to suggest that diet has an important bearing on the development of arteriosclerosis In parts of the world where poor nutrition is prevalent, a low incidence of arteriosclerosis has been reported In China, Oppenheim and Snapper observed little arteriosclerosis even in persons dying at an advanced age [25 26] In Okinawa, Steiner, in a recent article on a hundred autopsies in all age groups, found only seven instances of minimal arteriosclerosis [27] Likewise, Wilens has recorded similar findings from Costa Rica [28] The diet in these countries is characteristically low in cholesterol, protein, and calories and is made up chiefly of carbohydrates of vegetable origin

The tendency for individuals who are obese to succumb more commonly to sequelae of arteriosclerosis and coronary or cerebral occlusions has been noted by analysis of statistics by life insurance companies [29] Wilens has also pointed out that obesity favors the presence of advanced arteriosclerosis as indicated in a study of 1,250 necropsies performed at Bellevue Hospital [28] French and Dock stated that 73 of 80 young soldiers dying of coronary arteriosclerosis had some degree of obesity [30] Wilens has also re-

ported a regression of the arteriosclerotic plaque in humans following weight loss or cachexia.[21]

It was, therefore, considered of interest to determine the effect of diets rich or poor in dietary cholesterol on the serum cholesterol level. In the first phase of this study, the response of the serum cholesterol of 35 patients with various diseases to a single meal rich in fat and cholesterol was determined. The method of study was as follows: blood for analysis was taken at 8 A.M. with the patient in the fasting stage. Breakfast consisted of fruit, two eggs, buttered toast, coffee, and 200 cc. of milk to which 20 Gm. of cholesterol had been added. Dinner and supper were served at the usual hours. Additional blood samples were taken at 10 A.M., noon, 4 P.M., and 8 A.M. the following day. The results showed clearly that little or no change in the serum cholesterol occurred during the course of twenty four hours, regardless of the feeding of a large amount of cholesterol.

In the second phase of this study, nine individuals were placed on diets high or low in fat and cholesterol. They were first given a diet containing 300 Gm. of fat for six weeks and then without interruption placed on a diet containing less than 50 Gm. of fat. In five of the nine patients, there was no increase in total serum cholesterol during the period of high fat feeding. In four cases, a slight rise seemed to occur. However, this increase was not striking. Furthermore, at a later time three of the patients were placed on the high fat diet for a second period, but at this time 10 Gm. of cholesterol in 200 cc. of milk was added to the regimen. No significant change resulted in the serum cholesterol levels.

The serum cholesterol values of the patients on a low fat diet were no different from those during the control periods.

This study has recently been repeated in four patients with coronary arteriosclerosis. After an initial control period the patients were given 100 Gm. of egg yolk powder containing 8 per cent cholesterol daily for six weeks. At the end of this time, the diet was changed to one low in cholesterol (butter, cream, egg yolk, and fatty meats were excluded) for six additional weeks. Only minor changes in the serum cholesterol levels were found. It was possible in this experiment to estimate the quantity of cholesterol actually absorbed and metabolized by determining the amount of sterol excreted in the stool. No significant differences in the sterol excretion occurred during initial control and high or low fat and cholesterol diet periods. It can, therefore be assumed that the dietary cholesterol was either metabolized or laid down in the tissues. The latter seemed unlikely because clinically there was no evidence of deposition of cholesterol in the body (total amount fed in six weeks exceeded 336 Gm.). With the serum cholesterol and fecal sterol content essentially unchanged, one might infer that the mechanism of cholesterol turnover in the body is very active and able to handle large amounts of exogenous cholesterol. If this were not so, then an elevation of serum cholesterol would be expected on a high cholesterol diet, and conversely, a fall in the serum cholesterol on a low cholesterol diet. Further studies of this problem by the isotope technic are indicated.

In the third phase of the effect of diet on serum cholesterol, ten patients with well-documented bouts of coronary thrombosis were placed on a low cholesterol diet for periods from four to fourteen months. Butter, egg yolk, cream, and fatty meats were excluded from the diet during the low cholesterol regimen. Oleomargarine, a vegetable fat, was allowed. The patients were followed in the outpatient department, so strict adherence to the diet may not have been observed. However all the patients were most cooperative. Serum cholesterol determinations were made at biweekly intervals, or at monthly intervals. Preliminary results of this study indicate that the serum cholesterol levels were not significantly different from the determinations of the initial regular diet period. Considerable fluctuations of the serum cholesterol level occurred during both the period of regular diet as well as during the low cholesterol diet period. Although the serum cholesterol levels were not significantly altered by the lowered cholesterol intake, it is not possible to judge adequately whether this regimen resulted in any change in the clinical status of the patients.

The recent demonstration by Rittenberg and his coworkers that cholesterol can be synthesized in the body from acetate—a substance formed in the metabolism of fat and possibly from glucose and protein—is pertinent to the problem of reduced cholesterol intake.[23] If the body synthesizes excessive amounts of cholesterol, the restriction of intake would be to little avail. However, the overburdening of an already disturbed cholesterol metabolism by excessive cholesterol ingestion might be harmful. Further studies are necessary before a final evaluation of this problem can be made.

Summary

An acceptable laboratory tool is now available to test methods of preventing or curing arteriosclerosis, since arteriosclerosis, similar to that occurring in humans, has been produced in young dogs by the feeding of cholesterol and thiouracil.

Choline has been found to have a protective action in preventing experimental arteriosclerosis in rabbits for a limited time.

A study of patients with overt coronary arteriosclerosis reveals that the serum cholesterol levels are higher and inconstant in contrast to lower and more stable values in normal individuals of the same age group An attempt to evaluate the significance of the cholesterol content of the diet in patients with coronary arteriosclerosis has been made It has been shown that within the limits of this study, varying the cholesterol content of the diet fails to produce significant alterations of the serum cholesterol levels Preliminary results indicate that large amounts of dietary cholesterol can be absorbed from the gastrointestinal tract without alteration of the serum cholesterol or clinical evidence of cholesterol deposition in the tissues Further studies in cholesterol metabolism using tagged atoms are needed

References

1 Dublin L I Am J Pub Health 37 152 (1947)
2 Editorial J A.M A. 136 252 (1948)
3 Mönckeberg J G Virchows Arch. f path. Anat. 171 141 (1903)
4 Sappington, S W , and Cook H S Am. J M Sc 192 822 (1936)
5 Steiner, A , and Domanski B *ibid* 204 79 (1942)
6 Moritz A. R., and Zomcheck, N Arch. Path. 42 459 (1946)
7 Windaus, A Ztschr f physiol. Chem. 67 174 (1910)
8 Anitschkoff, N Beitr z path. Anat. u. z allg. Path. 56 379 (1913)
9 Duff, L Arch Path 20 81 (1935)
10 Steiner, A. and Kendall, F E Arch. Path. 42 433 (1946)
11 Best C H Ferguson, G C , and Hershey, J M J Physiol. 79 94 (1933)
12 Steiner, A. Proc. Soc Exper Biol. & Med 38 231 (1938)
13 *Ibid* 39 411 (1938)
14 Kesten A. D , and Silberwitz R. *ibid.* 49 71 (1492)
15 Andrews K. R., and Broun, C O Proc. Am. Soc. Clin Inv 19 786 (1940)
16 Bloor W R., Pelkan, K. E , and Allen, D H. J Biol Chem. 52 191 (1922)
17 Schonheimer, R., and Sperry, W M. *ibid* 106 745 (1934)
18 Steiner, A., and Turner, K. B J Clin. Investigation 18 45 (1939)
19 Steiner, A and Domanski, B Arch Int. Med. 71 397 (1943)
20 Levy, R. L , and Russell, N G Am. J M. Sc 197 241 (1939)
21 Lerman, J and White, P D Proc Am. Soc. Clin. Inv (1946)
22 Boas E P J Mt. Sinai Hosp 12 79 (1945)
23 Leary, T Arch. Path. 21 459 (1939)
24 Dock, W J A.M A 131 875 (1946)
25 Oppenheim F Chinese M J 39 1067 (1925)
26 Snapper, I Chinese Lessons to Western Medicine New York, Interscience Publishers Inc. 1941
27 Steiner, P E Arch. Path. 42 359 (1946)
28 Wilens, S L Arch. Int. Med 29 129 (1947)
29 Dublin, L I Human Biol. 2 159 (1930)
30 French A J , and Dock, W J A.M A. 124 1233 (1944)
31 Wilens, S. L Am J Path 23 793 (1947)
32 Rittenberg D and Bloch, K. J Biol Chem. 154 311(1944)

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MILITARY VALUE OF ACTUARIAL TECHNICS

Armies can now predict disease and noncombat casualties and measure their manpower and material needs well into the future through the application of actuarial technics, a process applied during the recent war, E A. Lew and F A. Weck of New York, both of the actuarial department of the Metropolitan Life Insurance Company, said in a paper presented before the Centenary Assembly of the Institute of Actuaries of London on June 25

Citing the experience of World War II when the U S Army made extensive use of actuarial procedures in planning their manpower needs and meeting their general requirements, Mr Lew and Mr Weck said that measurement of disease and noncombat casualties constitutes a major need, as they represent the great bulk of the casualties This is even true, they said, in periods of major battle operations In the peak casualty period between June 6, 1944, and VE Day, when 450,000 wounded were admitted to hospitals in European and Mediterranean theaters, those were only 35 per cent of the total number of patients admitted from all causes

The actuarial studies showed that there is no fixed rate of casualties but that it is related to numerous factors, including environmental conditions, special hazards, seasoning of troops, and nature of missions In the last war, as the troops became seasoned, the army as a whole showed a constantly decreasing hospital admission rate from disease and noncombat disability

The admission rate was 2 4 per day per 1,000 in 1943, then dropping to 2 1 in 1944, and to 1 9 in 1945, the latter being only slightly above the rate for the highest year of the 1930's

Hospitalization represents a multiple military problem, the actuaries pointed out, involving not only adequate placement of facilities and the procurement of sufficient medical services but also the adequacy of manpower for the active forces During World War II, for example, the U S Army medical requirements involved handling 15,000,000 admissions to hospitals, 3,200,000 cases treated in dispensaries, and 130,000,000 outpatient treatments for those not excused from duty

FALSE SEROLOGIC TESTS FOR SYPHILIS IN INFANTS OF TREATED MOTHERS

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TO ESTABLISH the diagnosis of syphilis in the newly born infant several procedures may be necessary These include *serologic tests*, physical examinations, roentgenograms of the long bones, dark field examination of scrapings from the umbilical vein, and dark field examination of any suspicious lesion on the skin or mucous membrane. The limitations of serologic tests as a means of diagnosis have long been recognized In 1915, nine years after the *Wassermann test was* devised, Fildes reported on its unreliability in the diagnosis of syphilis in the newborn.[1] Since that date many observers have pointed out that a positive serology in the early weeks of life may reverse the negative, the infant remaining free from all signs of the disease, and a negative may reverse to positive, the infant developing typical signs of congenital syphilis

The present study is based on the serologic findings of 470 infants of treated syphilitic mothers examined during the past three years at Bellevue Hospital, New York City, under the joint auspices of the Pediatric Department and the Rapid Treatment Center The plan of follow-up consisted of serologic tests, roentgenograms of the long bones, and a physical examination during the first week of life If all findings were negative, these procedures were repeated at intervals of four weeks until the age of six months From the sixth month to one year, serologic tests and physical examinations were made at intervals of three months Infants showing positive serology without other evidence of infection were examined at weekly intervals until the diagnosis of syphilis had been eliminated or confirmed Thereafter, the follow-up was continued on the regular routine It was impossible to adhere to this schedule in all cases. Blood specimens taken on infants less than a week old were frequently reported hemolyzed or of insufficient quantity Moreover some infants were born in hospitals in which no early tests were taken The majority of the cases received their first serologic test during the second month of life

Routinely, a Wassermann and a precipitation test were performed on each specimen If one or both of these were positive, the second test was titrated, and titrated tests were repeated until the diagnosis was established Cases showing a plus-minus or doubtful on the first check and negative on the second were not considered false positives A small percentage of cases had negative serologic tests up to eight or twelve weeks of life and subsequently gave one positive reaction which, within one to four weeks reversed to negative and remained negative in subsequent examinations Such cases were excluded from the study and were *interpreted as false positive* reactions, possibly due to an intercurrent febrile or toxic condition. On the same basis delinquent *cases whose serologies* were not checked until after the third month of *life* and who showed a positive reaction which reversed to negative were also excluded

Although this report deals primarily with the incidence of false positive serology, all instances of *so-called false negative tests* were recorded. The occurrence of negative serologic tests in the early weeks of life reversing to positive with the development of syphilic manifestations in the infant *was rare in the group studied* In the total 470 cases, only 5 (1 0 per cent) fell in this category, of these one showed a typical reversal in one acquired syphilis was probable, and in three, who *had had negative tests at Bellevue, a diagnosis of* syphilis was made at other hospitals These cases were not suitable for tabulation because of lack of serologic data

TABLE 1.—INCIDENCE OF FALSE POSITIVE SEROLOGY IN INFANTS OF TREATED MOTHERS (1945–1947)

Age at Earliest Serologic Test	Infants Tested	Serologic Results		
		Negative	Positive	Per Cent Positive
1st month	146	77	69	47 3
2nd month	232	216	16	6 9
3rd month	87	86	1	1 15
Total	465	379	86	18 5

Table 1 shows the results of serologic tests in 465 infants of treated mothers Four hundred and sixty two mothers had received penicillin therapy and three, arsenicals and bismuth. One hundred forty-six infants were examined in the first month of life, of these 77 gave a negative and 69 (47 3 per cent) a positive reaction which reversed to negative Two hundred and thirty two infants received their first *serologic test* during the second month of life, of these 216 gave a negative and 16 (6 9 per cent) a false positive reaction When the first serologic test was taken during the third month of life in 87 cases, 86 gave

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a negative and one (1 15 per cent) a false positive reaction For the total group, 18 5 per cent gave false positive reactions The actual occurrence of such reactions in the newborn, however, is presumably more accurately represented by the 47 3 per cent found in the infants examined during the first month of life

The duration of false positive serologic reaction in the infants varied from twenty-four days to fourteen weeks Weekly follow-up of the newborn was unsuccessful in so many cases that the analysis of the duration was based on tests taken at four-week intervals Thirty-one of the total 86 had become negative at four weeks of age In 55 cases which remained positive at four weeks, 32 had become negative at eight weeks In 23 cases which remained positive at eight weeks, 17 had become negative at twelve weeks In six cases with positive serologic tests at twelve weeks, four had become negative at fourteen weeks

Of the total 86 infants with false positive serologic tests, 36 per cent had reversed to negative at the age of four weeks, 74 5 per cent at eight weeks, 93 per cent at twelve weeks, and 97 7 per cent had reversed to negative at fourteen weeks Of the two cases whose serology was positive at fourteen weeks, one had a negative Kahn and a three plus Wassermann The other had a four plus Mazzini and a four plus Wassermann The latter case presented several points of interest

Case Report

The mother had been treated two years prior to pregnancy with arsenicals and bismuth The amount of her treatment could not be ascertained Her serology was four plus The patient, her first pregnancy, was born at term A serologic test on the sixth day of life was four plus Titered Wassermann and titered Mazzini tests on the fourth week of life were positive to 1 to 16 dilution Roentgenograms of the long bones were negative, and the infant was normal. Weekly examination showed a slight but consistent drop in titered Wassermann and Mazzini tests, negative roentgenograms, normal gain in weight, and negative physical findings At fourteen weeks and two days (100 days) all findings were normal except the serologic tests, which were four plus in both the Wassermann and Mazzini Unfortunately, the patient did not return for reexamination until twenty-one weeks of age, when her serology was negative and other findings were normal. On the twenty-sixth week of life the serologic tests were again negative, and all other findings were normal

To ascertain the relationship of the time of the mother's treatment and the occurrence of a false positive serology in the infant, 110 cases in which accurate information on the mother's therapy could be obtained were reviewed In this series one mother was treated with arsenicals and bismuth, 109 received penicillin All infants were examined before the third month of life The results are shown in Table 2

In nine cases of mothers treated prior to pregnancy, eight of whom received penicillin and one arsenicals and bismuth, seven infants had negative serologic tests and two infants (12 2 per cent) false positive tests In 25 cases of mothers treated in the third and fourth month of pregnancy, 21 infants had negative serologic tests and four (16 0 per cent) false positive tests In 30 mothers treated in the fifth and sixth month of pregnancy, 23 infants had negative serologic tests and seven (23 3 per cent) false positive tests In 46 cases of mothers treated in the seventh and eighth month, 25 infants had negative serologic tests and 21 false positive (45 7 per cent)

The first group of nine mothers treated prior to pregnancy is too small to be of statistical value, but the second, third, and fourth groups showed an increasing percentage of false positive tests in infants whose mothers were treated late in pregnancy

Correlation was attempted of the mothers' serologic test with that of the infants taken on the same day and during the first week postpartum Such comparison could be made in only fifteen cases Of these, eight gave identical results for mother and infant In four, the mother's serology gave a higher titer and in three a lower titer In one case the mother's serologic test was negative one month before delivery and one month after delivery, while the infant's test gave a false positive reaction There were three sets of twins among the cases studied In two, both infants had negative serologic tests In the third, both gave a four plus reaction to Kahn and Wassermann tests on the eighth day of life, a two plus at the fourth week, and negative at the eighth week, the serologic reactions following identical patterns in each case

TABLE 2.—Relationship of Time of Mother's Treatment to Serology of Nonsyphilitic Infants in 110 Cases Tested During First Month of Life

	Prior to Pregnancy			Third or Fourth Month of Pregnancy			Fifth or Sixth Month of Pregnancy			Seventh or Eighth Month of Pregnancy		
	Negative	Positive	Total	Negative	Positive	Total	Negative	Positive	Total	Negative	Positive	Total
Serologic results	7	2	9	21	4	25	23	7	30	25	21	46
Per cent	77 8	22 2	100	84 0	16 0	100	76 7	23 3	100	54 3*	45 7	100

* Penicillin therapy used in all cases except one, which was treated prior to pregnancy with arsenicals and bismuth.

Although the occurrence of false positive and false negative serologic tests in the newborn is mentioned by many authorities, statistics of incidence are comparatively rare [2-5] Ingraham in a 1941 publication, prior to penicillin therapy, reported 16.2 per cent false positive and 4 per cent false negative serologic tests on infants examined during the first ten days of life.[4] His more recent publication on penicillin therapy in pregnancy records 38 per cent false positive reaction in infants of treated mothers [5]

To compare further the incidence of false positive serologic reaction in the offspring of mothers treated with arsenicals and bismuth with the incidence in penicillin-treated mothers, the tests taken in the Bellevue Pediatric Clinic from 1940 to 1943 were reviewed One hundred thirty six infants of mothers treated by the former method were examined during the first two months of life Of these, 13 (9 6 per cent) gave positive serologic tests which reversed to negative. This figure is probably 30 to 40 per cent too low because few infants were tested in the first week of life Allowing for this discrepancy, however, the offspring of penicillin-treated mothers gave a much higher ratio of false positive serology

Comment

The percentage of false positive serologic tests in the cases reviewed and compared with the reports made on the offspring of mothers treated with arsenicals and bismuth would indicate that with penicillin therapy in pregnancy a greater number of infants will give false positive reactions This is presumably due to the fact that an amount of penicillin adequate to cure syphilis in the mother can be given in a short time and is equally effective in preventing syphilis in the infant when administered prior to pregnancy or in the first second, or third trimester [6]

Whether the positive serology of the newborn infant reversing to and remaining negative represents a transfer of the reagin of the mother's blood to the infant, or whether it indicates persistence of the positive serology of syphilitic fetus treated and cured in utero by therapy administered to the mother during pregnancy, is not susceptible of proof in any given case. Several investigators have demonstrated that penicillin is transmitted through the placenta and is present in the fetal blood [7,8] The high percentage of false positive serologic tests in the infants of mothers treated with penicillin late in pregnancy suggests that penicillin so transmitted to the fetus has cured syphilis in utero This probability is discussed by Speiser in a recent publication.[6]

In cases of mothers who have secondary syphilis during pregnancy and who receive treatment in the eighth month of pregnancy, it seems highly probable that the false positive of the infants is not properly termed "false" but is evidence of a treated syphilitic infection contracted and cured in utero In cases of mothers who are treated prior to pregnancy and received no treatment during pregnancy, it seems probable that a positive serologic test on the infant, which reverses to negative represents a transfer of the reagin of the mother's blood If these possibilities are accepted, the so-called false positive serology of the newborn has a dual cause

Summary

1 A report on 470 infants of treated syphilitic mothers examined within the first three months of life for serologic, clinical, and roentgenologic evidence of syphilis is presented

2 False positive serologic tests were found in 47.3 per cent of infants tested in the first month of life, in 16 per cent of infants tested in the second month of life and in 1.2 per cent of infants tested in the third month of life.

3 False negative reactions were found in five cases or 1 per cent of the total. In one of these syphilis was probably acquired

4. The duration of false positive serologic tests varied from twenty four days to fourteen weeks Of the total, 36 0 per cent had become negative in four weeks, 74 per cent in eight weeks, 93 per cent in twelve weeks, and 97 7 per cent in fourteen weeks

5 Correlation of the number of false positive serologic tests with the time of mother's treatment shows a higher percentage in the infants of mothers treated in the last trimester of pregnancy

6 Compared with statistics based on mothers treated with arsenicals and bismuth, a greater number of false positive serologic tests can be expected in the infants of mothers treated with penicillin.

7 The question of false positive serologic tests in the newborn representing a transfer of reagin of the mother's blood or the persistent positive serologic test of syphilitic fetuses treated in utero is discussed

References

1. Fildes, Paul: J Obst. Gynec. Brit. Emp. 27: 124 (1915).
2. Ingraham, N R.: Am. J Syph. Neurology 19: 547 (Oct.) 1935.
3. Faber H. K., and Black, W C.: Am. J Dis. Child. 51: 1237 (June) 1936.
4. Ingraham N R., Shaffer B., Spence B E., and Gordone, J H.: Arch. Dermat. Syph. 43: 323 (Feb. 19) 1941
5. Ingraham, N R., Stokes, J H., Beerman, H., Lentz, J W and Wammack, V S.: J.A.M.A. 130: 583 (March 16) 1946.
6. Speiser, M. D., Flaum, G., Moon-Adams, D., and Thomas, E. W.: Ven. Dis. Inform. 28. 108 (June) 1947.
7. Wolfs J H. E. and Zintel H. A.: Am. J Obst. Gynec. 50: 238 (1945).
8. Wolfs H. H. E., and Wiley M. M.: J.A.M.A. 131: 969 (1946)

THE USE OF METHYLCELLULOSE AS A BULK LAXATIVE

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IN AVERAGE practice, many patients are observed whose chief or secondary complaint is constipation. One gastroenterologist noted an incidence of 45.2 per cent in a series of 5,000 private patients, while others have found an even higher percentage.[1] Gastroenterologists believe that chronic or atonic constipation may be due to improper diet, vicious habit formation, inadequate water intake, nervous factors, etc. In most instances, this type of constipation may be controlled by correct diet, increased water intake, or by correcting the patient's mental attitude through an explanation of the simple rules of bowel hygiene.[1,2] For the patients who fail to get the desired effect from such a regimen or who fail to abide by instructions, laxatives are frequently necessary.[3] For those patients who definitely require laxatives, the present trend in prescriptions has been away from the irritant cathartics toward the hydrophilic colloids.[1,4]

Aside from dried fruits frequently included in the diet to provide bulk, the usual hydrophilic colloids are principally agar, sodium alginate (kelp), acacia (acacia Senegal or gum arabic), tragacanths (Astragalus), karaya (false or Indian tragacanth derived from the tree Sterculia urens), and psyllium (Plantago psyllium, known as French or Spanish psyllium seed, and Plantago ovata, known as Blond Psyllium or Indian Plantago Seed).[5]

Gray and Tainter, in a comparative study of the colloid laxatives, concluded that agar is one of the least effective, while tragacanth and psyllium derivatives are considerably more efficient.[6] They concluded that tragacanth derivatives exert their laxative action primarily through colloidal swelling, while purified psyllium products add to their lesser swelling a mild irritant effect from their breakdown products.

The recent development of some synthetic mucilages, such as methylcellulose, provides a hydrophilic colloid with excellent possibilities as a laxative. Laboratory studies have shown that methylcellulose is nontoxic to rats when fed over prolonged periods of time.[7] It was also demonstrated that methylcellulose passes through the digestive tract of humans virtually unchanged, as it may be recovered almost entirely from the feces.[8] Further theoretic advantages claimed for this synthetic chemical are that it is not absorbed from the intestinal tract, that it is not broken down by chemical enzymes, and that it is nonantigenic. In addition, there is a high degree of chemical uniformity, frequently lacking in the natural gums.[9] Methylcellulose also differs from the natural gums in the way in which it takes up water. Whereas the latter take up water like a sponge, limited by their individual ability to swell, methylcellulose forms a colloidal solution in any given amount of water, the viscosity varying from a thin, demulcent liquid to a soft, smooth gel. This characteristic should make it virtually impossible for methylcellulose to produce an impaction, a disadvantage occasionally observed with the natural gums.

Tainter first investigated the use of methylcellulose as a colloid laxative and found that 10 Gm. per day approximately doubled the volume of the stool. The stools were soft and easily passed without colic or griping.

Experimental Procedures

The theoretic and preliminary experimental evidence indicated that methylcellulose* should approach the ideal as a colloid laxative. In order to evaluate further its clinical effectiveness and to determine the dosage required, a study was undertaken. Thirty-seven patients were given the drug for relief of acute and/or chronic constipation, that is, for the relief of a delay in defecation which brings discomfort, worry, or indigestion. It should be noted that subjects for this study were taken at random from routine office practice.

Patients were instructed to take two tablets (1 Gm.) or 2 teaspoonfuls (6 Gm.) at bedtime with one or two full glasses of water. In some instances, it was necessary to increase the initial dose of medication used before a reasonable therapeutic effect was achieved, such increases, if any, being included in the accompanying table. Patients did not take more than two full glasses of water at the time of administering medication, because several complained of the difficulty of drinking larger quantities. It should be further noted that all of these 37 patients were seen and examined at least once every two weeks and that most of them were seen at intervals of one week.

Results

In general, the therapeutic results observed were very good as tabulated (Table 1). In 23 cases (62 per cent) results were "excellent," i.e., a normal soft, bulky stool was passed without griping, cramping, or tenesmus, at least once a day. In 11 cases (30 per cent) results were "good." These patients passed five or more

* Supplied in the form of 0.5 Gm. tablets or as granules by the Maltine Company under the trade name, Cellothyl.

TABLE 1.—RESULTS OF TREATMENT OF 37 PATIENTS WITH METHYLCELLULOSE

Case Number	Sex	Age	Duration of Constipation	Habitual Use of Laxatives or Enemas	Dosage of Granules (Teaspoonfuls)	Dosage of Tablets	Duration of Administration	Therapeutic Results: Excellent	Fair	Poor	None
1	F	37	15 years	Yes	2		4 days	X			
2	F	44	5 to 7 years	Yes		3	60 days	X			
3	F	33	5 years	Yes		2–4	100 days				X
4	F	23	1 week	No	2		4 days	X			
5*	F	25	2 weeks	No		3	40 days	X			
6	F	62	4 weeks	No	2		7 days	X			
7	M	27	1 week	No	2		3 days		X		
8	F	24	1 week	No		3	3 days	X			
9	F	31	10 years	Yes	2		240 days	X			
10	F	30	5 years	No		2–6	21 days			X	
11	F	27	5 years	Yes		2	21 days	X			
12	F	38	10 years	Yes	2–3		30 days		X		
13*	F	35	3 weeks	No		2–3	45 days		X		
14	F	30	4 to 5 weeks	No		2–3	1 week	X			
15	M	24	2 weeks	No	2		1 week		X		
16	M	29	3 years	Yes		3	60 days	X			
17	F	22	2 years	Yes		2–3	75 days		X		
18	F	38	10 years	Yes		3–4	180 days	X			
19	F	25	5 years	Yes		2	100 days	X			
20	M	44	10 years	Yes		3–4	30 days	X			
21	F	27	2 weeks	No	2		4 days			X	
22*	F	36	12 weeks	No		3	30 days	X			
23	F	44	10 years	Yes		3	*1 days		X		
24	F	14	1 year	Yes		2	21 days	X			
25	F	31	1 year	Yes		2	120 days		X		
26	F	36	3 weeks	No		3	90 days	X			
27	F	26	4 years	Yes		3–4	30 days		X		
28	F	21	2 weeks	No		2	7 days	X			
29	F	33	5 years	Yes		4–6	30 days	X			
30	F	30	6 weeks	No		2	14 days	X			
31	M	40	5 years	No		3	110 days		X		
32	M	38	8 weeks	No		3	14 days		X		
33	F	33	5 years	Yes		2	30 days	X			
34	F	32	5 years	Yes		3–4	30 days	X			
35	M	3*	12 weeks	No		3	30 days	X			
36*	F	24	3 weeks	No		3	140 days		X		
37	M	34	5 years	Yes		4	21 days	X			

* Pregnant.

stools a week, used no other laxative or bowel movement aid, and declared themselves comfortable. In only 8 per cent were the results unsatisfactory where no change in bowel habits was noted and no relief from constipation was effected

Four of the patients under observation were pregnant In two of these results were "excellent" and in the other two "fair"

The only adverse effect noted was that of nausea and, occasionally vomiting at the time of swallowing or attempting to swallow the granules Since these patients showed no symptoms of nausea or vomiting on swallowing tablets, the nausea was no doubt caused by the mechanical difficulty of swallowing the light-bodied, floating granule Patients who continued the medication for the longest periods of time used the tablets in preference to the granules It was also observed in this same group that constipation was controlled by dosages three to four times weekly None of them felt the need for daily medication

At no time did I observe clinically any systemic change in these or any of the 37 patients although the duration of administration of medication varied from three to two hundred forty days Patients were comfortable and had no griping or cramping effect following the use of the tablets nor had they any other gastrointestinal complaints

Summary

Methylcellulose in dosages of 1 to 6 Gm. daily proved effective for the relief of chronic or acute constipation in the majority of the 37 cases Its use resulted in the passage of a normal, soft bulky stool without griping, cramping, or tenesmus in most cases Its prolonged use (up to eight months) did not produce evidences of systemic changes or toxicity

References

1. Portis, S. A.: Diseases of the Digestive System, Philadelphia, Lea & Febiger 1944 p. 558.
2. Bockus H. L.: Gastro-Enterology Philadelphia W B. Saunders Co., 1943, Vol. 11 p. 826.
3. Conferences on Therapy NEW YORK STATE J MED 47: 504 (Mar 1) 1947
4. *Ibid.* 47: 387 (Feb 15) 1947
5. Wood H C., and Osol A.: U S. Dispensatory Philadelphia, J B. Lippincott, 1943
6. Gray H. and Tainter M L.: Am. J Digest. Dis. 8: 120 (Apr.) 1941
7. Deickens n, W., and Witherup S : J Lab & Clin. Med. 28: 1725 (Nov.) 1943
8. Machle, W, Heyroth F F and Witherup S : J Biol. Chem. 153: 551 (May) 1944
9. Editorial J A M A 127: 922 (Apr 14) 1945.
10. Tainter M L. Proc. Soc. E per Biol. & Med. 54: 77 (1943)

THE EARLY CARE OF HAND INJURIES SOME COMMON DIFFICULTIES

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THE OUTCOME of any injury of the hand is in large measure determined by the nature of the treatment rendered by the physician who first deals with it definitively The significance of this fact is apparent when it is recognized that not only every surgeon but every general practitioner is called upon at some time to deal with injuries of the hands His professional equipment should, therefore, include a familiarity with the principles of their proper treatment

It would be a basic error to consider injuries of the hand as lying in the field of "minor surgery " This concept may lead to the relegation of such conditions to the less experienced men on hospital and clinic staffs and, in general practice, to the assumption of responsibility for them by physicians of relative inexperience in this field This is not to say that only the older men on clinic staffs should deal with injuries of the hand Wide experience and expertness in abdominal or thoracic surgery, for example, are not necessarily qualifications for this work, and even the surgeon who is renowned for his skill in such fields may not necessarily be best qualified to deal with the injured hand It does imply, however, that in each clinic or hospital staff there should be at least one man who has interested himself in this type of work, who has familiarized himself with the anatomy and physiology of the hand, and who has kept abreast of the development in this field He should be responsible for the proper management of these conditions and should be charged with the continuing instruction, supervision, and guidance of residents, interns, and students in matters of hand surgery

Another error inherent in the "minor" concept is that of neglect and delay on the part of the patient or of temporizing on the part of the doctor or both No injury of the hand should be regarded as of minor consequence It is necessary only to be reminded of the distressing and disabling results that have been seen to follow the neglected pinprick or the disregarded blister It is arresting to realize that every crippling purulent tenosynovitis, every major destructive cellulitis of the hand was, at the start of its career, a "minor" injury The point of view which would classify injuries (and infections) of the hand as "minor surgery" would imply that it is permissible to repair hand wounds (even to unite divided tendons) in emergency rooms and to conduct the drainage of infections or the search for foreign bodies in outpatient departments Such an attitude might well lead to difficulties whether the work is done in hospitals or undertaken in the clinics of industrial plants or in the offices of physicians

To go from the general to the particular, observation over a period of years emphasizes some of the more common difficulties which may arise in the management of hand injuries These are evidenced by cases admitted to our hospitals for their correction or for later reconstructive surgery

Burns

During recent memory the treatment of burns of the hand has run the gamut from carron oil and other greases, through the period of tannic acid, supplemented later by dyes and escharotics, the period of active débridement, the period of local antiseptics and antibiotics, and back to bland and protective grease again There has been some enthusiasm for each of these methods, and in turn their shortcomings and disadvantages have led to the abandonment of all but the last

All the salient and distinguishing features of the present accepted treatment are important in determining the ultimate result [1] Strict aseptic technic in the performance of dressings from the very start, gentle and nontraumatizing cleansing, the avoidance of irritating antiseptics, the application of an effective pressure dressing with separation of the fingers, the maintenance of the hand in the proper position of function, and noninterference with the initial dressing for a period of ten days or more are not safely to be disregarded Important also is the dictum of masking and strict asepsis while performing dressings, and the policy of the application of skin-graft covering at the earliest possible moment When an extensive but nicely granulating wound is present with satisfactory epithelization at its margins, the temptation is strong to allow healing to progress without the bother of grafting Such a policy, however, leads to the prolongation of superficial infection, lengthened immobilization and disability, and ultimately to increased cicatrization and perhaps contractures

Puncture Wounds

The neglect of minor puncture wounds by patients is proverbial Little notice is taken of them other than perhaps to "suck out the

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poison" (often adding contamination by mouth organisms in the process) and possibly to dab on an ineffective antiseptic The late results of many such injuries are too familiar Among the most deplorable of this type of wounds are those inflicted by human teeth The patient often fails to seek aid until cellulitis is well established and, when he does will more often than not give a false history of the injury, claiming contact with a wall or door or some hurt connected with his occupation as the cause The physician who has seen a few of these tooth wounds will not be deceived and will at once recognize the condition for what it is by its characteristic appearance and odor In deference to the severity of such infections it was the earlier teaching to treat these injuries by the application of strong antiseptics or even of nitric acid or other cauterizing agents

Such treatment, now proved as ineffective as it was painful, ignored the primary requisites of adequate ventilation and the careful removal of devitalized tissue In tooth wounds of the knuckles these requirements demand an incision extending some distance up the dorsum of the hand to expose injured and contaminated tendon and paratenon withdrawn into the dorsal subcutaneous space when the clenched fist is opened These measures, plus the local application of moist dressings with zinc peroxide paste and the generous systemic exhibition of penicillin, have proved not only the most effective treatment for the case with established infection but may be considered obligatory even in the fresh case as the best insurance against invasive infection which, without them, will almost certainly develop [2]

Foreign Bodies

The metallic foreign body imbedded in the tissues of the hand that shows so clearly on the x-ray film offers a tempting target for removal Such a search, however, conducted without accurate localization or surface marking in a bloody field with inadequate lighting and exposure perhaps under local anesthesia and possibly without exact familiarity with the anatomy of neighboring structures, may prove anything but rewarding Such attempts may lead to fatigue, discouragement and failure leaving besides the foreign body traumatized tissue and perhaps added infection as their results. It is undoubtedly true also that some foreign bodies small and deeply imbedded may be innocuous and are much better left where they are

On the other hand, the nonopaque foreign body such as a fragment of wood or glass easily lies undetected and unsuspected in the depths of an inadequately débrided wound to make its presence known later by continuing inflammation or a persisting sinus tract

Lacerations

Due to wartime experience the values of prompt débridement and closure of lacerated wounds of the hand are now more generally recognized than was formerly the case The chief difficulty in their management lies in the matter of accurate evaluation of the injuries sustained Complete division of a tendon is not easily missed Failure to visualize the structures or at least to test tendon function against resistance, may result in the missing of the partial division of a tendon which will subsequently pull completely apart Division of intrinsic nerves of the hand and particularly of the digital nerves, may readily escape detection

The importance of undertaking the necessary wound examination, débridement suture, or repair of structures under optimum conditions of anesthesia, asepsis, hemostasis, lighting, assistance, and equipment cannot be overemphasized The lack of some or all of these factors may lead to incomplete investigation, inaccuracy, and such technical errors as the confusion of tendon and nerve in effecting union of divided structures

Methods of primarily repairing severed tendons vary considerably, as does the choice of suture material [3] The values of nonabsorbable material and the advantages and technic of the wire pull out stitch, as devised by Bunnell, have been amply demonstrated [4] Even with these advantages, surgeons have yet to be completely satisfied with the results of any method yet devised for the primary repair of a flexor profundus tendon when divided within the digital canal.[5] Certainly any chance of success is virtually eliminated when a divided flexor sublimis is repaired within the canal at the same time

The principles of the care of the hand following tendon injury and repair require emphasis It was, at one time the vogue to encourage the earliest possible active motion of repaired tendons "to prevent adhesions" until the contributions of Koch and Mason led to a better understanding of the physiology of healing of these structures and a recognition of the fact that three weeks of immobilization are necessary for firm union Wherever immobilization is practiced, the importance of the maintenance of the position of function must always be regarded A source of trouble may be avoided by not placing the splint on the same aspect of the hand and forearm as that of the repaired tendon where it would provide an immobile firm resistance against which the tendon might inadvertently test the strength of its union

Recognition of nerve injuries requires a work

ing knowledge of the motor and sensory functions of each within the hand, a sufficient familiarity with their anatomy to be able to find and identify the structures readily, and a careful investigation of the wound for this purpose [6] The proper primary union of severed nerves in the hand or fingers is a delicate business requiring optimum conditions for its performance Yet the importance of effecting it needs repeated emphasis The repairing of severed digital nerves may be overlooked most easily Following repair of motor nerves, the need for appropriate splinting to protect the denervated muscles against the pull of their physiologic opponents and their continued care to prevent serious atrophy are matters of great importance in the ultimate restoration of usefulness [7]

Traumatic Amputations

The amputation or partial amputation of a digit is one of the commonest industrial accidents The removal of an almost-severed finger forthwith seems hardly defensible, since experience has shown that the light suturing and adequate protection of such fingers, without attempt at immediate formal repair of their deeper structures, not infrequently results in their salvage for later restoration to usefulness

As there are now several well-recognized expedients for maintaining useful finger length and bringing about healing of the stumps of complete traumatic amputations, immediate re-amputation with flap formation can hardly be justified The resulting additional shortening, often including the sacrifice of a useful interphalangeal joint, now seems unwarranted, even on the basis of saving time, since the slightly shorter immediate disability must be purchased at the cost of a permanent diminution of useful function [8] Immediate grafting, the formation of various sorts of local covering flaps, or the open treatment to establish good granulations with later resort to grafting, are all methods which conserve length and function without great expenditure of time

Fractures

Simple bone injuries of the hand may occasionally escape detection This is particularly true of injuries to the metacarpal and carpal bones, because the resultant deformities are not readily apparent and because the tenderness and soft part swelling incidental to the trauma may obscure the characteristic signs Even the usual x-ray study may fail to reveal such fractures as those of the carpal navicular or the less common injuries of other carpal bones Their recognition by four-way plates and immobilization for a period of ten to twelve weeks will spare many prolonged disabilities or operations for fragment removal [9 10]

In the more obvious fractures of the long bones the greatest difficulties occur in the securing and maintaining of satisfactory reduction Flat splinting, now recognized as ineffective and harmful, has given way to traction in the position of function in the management of these conditions The advantages of skeletal traction, in appropriate cases, have been well demonstrated, and the various practical methods devised for its employment consitute a valuable contribution to the management of these fractures [11]

Major Injuries

The difficulties cited in dealing with lacerations, amputations, and fractures have even greater significance in those major traumas which may involve any combination of these injuries plus, in some instances, crushing and burning The importance of prompt débridement in these conditions is well recognized, but it should not be pursued with such enthusiasm as to sacrifice potentially viable tissues [3] The desire for thoroughness may well lead to excessive excision, which, in the compact and delicate structure of the hand, readily becomes injurious This is particularly to be guarded against in dealing with bone fragments In this respect it would seem that the same criteria might well be invoked as those employed in dealing with wounds of the face Certainly every bit of tissue that can safely be preserved should be spared, for it will contribute materially to a satisfactory result ultimately Whatever later reconstructive surgery may be contemplated in such conditions, the importance of the earliest possible skin coverage merits continued emphasis if the disabling effects of prolonged sepsis, deep scarring, and fibrosis are to be avoided

Summary

The benefits of the recognition and avoidance of the common difficulties involved in the early care of hand injuries, particularly important in a day of many industrial and transportation hazards, will be increasingly reflected in shortened periods of disability, conservation of important hand function, and the avoidance of many formidable reconstructive procedures

References

1 Allen Harvey S J A M A. 116 1370 (March 29) 1941
2 Cutler Condict W Jr The Hand Philadelphia, W B Saunders Co, 1941 p 215
3 Mason Michael L. J A M A 116 1375 (March 29) 1941
4 Bunnell Sterling Am. J Surg 47 502 (1940)
5 Koch S L and Mason, M L Surg Gynec & Obst 56 1(1933)
6 Winfield James M J A M A 116 1367 (Mar 29) 1941
7 Marble Henry C *ibid* 116 1373 (Mar 29) 1941
8 Cutler Condict W Jr The Hand Philadelphia W B Saunders Co, 1941, p 314
9 Thompson Jas. M Am. J Surg 21 214 (1933)
10 Cutler, Condict W, Jr Bull U S Army Med Dept 77 10 (June) 1944
11 *Idem.* The Hand Philadelphia W B Saunders Co 1941 p 259

THE PHYSICIAN AND THE VENEREAL DISEASE PATIENT

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(From the Youth Consultation Service)

IN SPITE of the activity of public clinics for handling the venereal diseases, as well as facilities for industrial workers and for men in military service, still a large part of the treatment of venereal disease patients rests with the general practitioner Often it is he who makes the first diagnosis, even though he may send the patient elsewhere for treatment. It is he who gets the impact of the patient s response to the discovery of the infection and initial anxiety It is he who is the actual fieldworker and casefinder for the health departments. And it is his skill or lack of skill in dealing with the patient that often determines the future success or failure in the total handling of the problem Too little attention has been given to the important part he may play in a program of eradicating the disease

It is no new idea—although the advent of psychosomatic medicine has emphasized it—that the art of medical practice is twofold, the treatment of a disease and the treatment of a person The development of modern science however with its laboratory technic, has tended to depersonalize this treatment to the extent that medical treatment can come close to being a mechanized craft rather than an art Diagnosis is based on work done by laboratory technicians who may never see the patient The old time doctor collected his materials himself and, in so doing, was able not only to explain the reason and reassure the patient but to get to know him better in the process Anyone who has been a recent hospital patient can realize the deadly impersonality of the present-day procedure The technician has been trained as a craftsman and cannot be expected to approach his work as an art that considers the material as well as the technic Too often, however, this impersonality extends to the nurse and doctor as well

Objectiveness has its value, in so far as it may prevent doctors and nurses from acting out in relation to a patient, their own complicated conflicts It may prevent the inflicting of unnecessary pain or medical discipline purely as punishment or may check a too ready sentimentality In the case of contagious disease the welfare of many others can be protected if painful demands are made upon the patient Nevertheless, the doctor and his nurse assistant who see their work as an art, a profession not as a craft can never forget that they are dealing with a person, not a case If the time ever comes when patients feel that using a private physician provides no greater chance for personal attention than does a clinic, private practice is doomed. Already there are increasing signs of distrust of the medical man The public is saying "Give us all the benefits of scientific medicine, but don t forget that we are suffering human beings Remember that you doctors are consecrated to healing the patient as well as the disease '

If all this applies to the practice of medicine in general how much more so does it apply to the treatment of patients afflicted with venereal disease Regardless of original causes, the method of handling the patient under treatment is one large factor to consider in the control of the disease as a social problem A patient medically cured, may readily acquire the disease again and spread it. A patient, treated as a whole may return to the community, not merely physically well but socially better adjusted, and as a result may be a possible source of prevention of the disease in others as well as in himself

In the establishment of a therapeutic relationship between a doctor and patient not only the feelings of the patient must be considered but those of the doctor himself The less mechanical and routinized the approach, the more the doctor s feelings play a part The intrusion into the office of a general practitioner by a patient with venereal disease may be seriously disconcerting If he comes from the community of which the doctor is a part, the need to keep a personal confidence may create awkwardness The patient s guilt makes him reluctant to express his feelings and his passivity or surface defiance can arouse impatience or punitive rejection

Here the physician s own attitude toward sex comes to the fore He grew up when social attitudes were different and may disapprove of present-day youth. Having in his power an undisciplined boy he may turn upon him his protest against the whole generation His personal dislike for the patient s race, social group or family may make him harsh. Out of his own youth he may retain bitterness guilt or a sense of deprivation about sex which becomes focused upon his patient He may himself have had little help in handling his problem, may even have had venereal disease and may retain a basic anxiety as to his own adequacy In his unconscious iden-

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tification, he may show repulsion or intolerance Even, he may be sexually stimulated by the patient's sexual problem and protect himself by this intolerance As a guardian of the public health, he may forget that the general public is pretty indifferent to disease except where it affects them personally Or as a member of a profession that represents the best in community responsibility and ethics, the physician may treat his patient as a culprit to be handled roughly and punished for his offense Increasingly, in the other broad fields of medicine, an effort is being made to help the sick to meet their social and emotional difficulties, but the venereal disease patient is still largely seen as the unsavory victim of his own folly

Let us look at those with whom the doctor is called upon to deal The patient who presents himself for the first time is probably a young man, still adolescent in development whether or not he has ventured into marriage He is the product of our present-day culture with its confused and inadequate handling of the sexual life of the young He has probably come from a home in which there has been a hushed attitude toward sex with only a giggling recognition that it exists His moral training has been haphazard—he has gone to church or Sunday school during his early years but has gained little from this other than a vague idea that there is a God, about whom he has no clear notions In a general way, his code is that of the Ten Commandments, but he has not learned much self-discipline, nor does he feel inclined to deny himself anything he can get He is restrained from antisocial behavior more by fear of punishment than by a code of ethics He accepts working as a means of obtaining material comforts He has paid little attention to literature or the arts because they do not contribute to earning higher wages He is pretty positive in his opinions about politics and economics, especially in denouncing those ideas which differ from the ones he has He reads the papers for the sports news, but editorials or special articles bore him

He thinks he knows what he wants out of life—as much money as he can get for as little effort as possible, physical comforts, and plenty of fun, of which sex is the most gratifying sort His sex knowledge and standards are uncertain and spotty, although he thinks he knows all the answers Some little information he has learned from his home, some from school or club leaders, or during his recent war service, but this is largely factual or in terms of what to avoid He knows something about venereal disease but is confident he can escape it Usually, he thinks in the common terms of vulgar speech, but he can use technical terms if necessary Much of what he knows he has picked up from boys and girls at his own level and out of his own experience He has outgrown masturbation and would feel cheated if he had to resort to it instead of finding some girl He has some romantic ideas from the movies about living his own life, and he supposes that some day he will find the right girl and settle down So far, though, he has kept his freedom and is glad of it Altogether, he is pretty sure of himself and feels he knows his way around

Suddenly, as the result of a bit of fun of no worse kind than usual, he is caught up short with the realization that something is wrong, a discharge or a sore Perhaps he had had a few more drinks than usual and had not been as careful about taking precautions or had been sure that the girl was clean At first he tries to make light of it, perhaps the discharge is merely a "strain"—he has heard of such things—or perhaps it is merely irritation, not a sore Anyhow, he is likely to try for a few days to ignore it, not wanting to believe that he has to pay a penalty for his fun He does not see his way clear to taking time from work to go to a doctor, even if he knows of one At last, however, his discomfort, physical or mental, becomes great enough to drive him to visit a doctor or a clinic

His smug self-satisfaction is badly shaken, and he approaches this visit with a great deal of anxiety For the first time he has to admit, and to a doctor—an adult, a parental representative—that he has been "playing around" All the childish guilt about being caught in forbidden activity floods over him He may assume a certain defiance or nonchalance to cover his fear, but he cannot hide it entirely He may fume with anger at the girl from whom he caught it or who, as he thinks, "gave it" to him He tries to excuse himself, to deny the seriousness of the infection, to recall what he has heard of the efficacy of modern treatment, but the fear persists In spite of his external manner, he is a frightened child who wants reassurance and comfort

The type of handling he gets may be one of the important influences in his whole life adjustment, may determine not only the extent of his cooperation and persistence in treatment but the handling of his sex life in the future Regardless of external hardness or sophistication, he knows he has made a mistake, and he may, underneath, be very sensitive about the whole matter It is not easy to expose oneself physically or emotionally to the pain and embarrassment of treatment At this point of lowered self-esteem he needs, more than ever, to be treated with the respect due to a sick man, not as a culprit or as an ignorant or degraded person The doctor who thinks to put him at his ease by using vulgar language makes a mistake If the patient is to

take his illness seriously, not as a mere bawdy joke upon himself, it is better for the doctor to treat it with the dignity accorded to any other ill ness and so reassure the guilty man. There is a question too, whether this is the best time to in quire into the source of the disease From the public health point of view it is important that all foci of infection be unearthed for delay may lead to other contaminations In his resentment the patient may be ready to denounce his partner, but, since this leads to investigation, he may on second thought regret his betrayal and fear for the safety of his own confidential relation with the doctor It would seem to be a more construc tive experience for him if his report of the source could be made when he is interested in cooperat ing to eradicate the disease from the community

And what of those innocently infected? A young woman about to have her first baby is found to have a positive Wassermann She may know little or nothing of the disease and yet it is important for her, as well as the physician to learn whether the condition is congenital or ac quired If she is an innocent victim and free from personal guilt the problem arises as to how to handle her feelings toward the parents she has loved and trusted or toward the husband she has chosen It is a bitter experience to submit to long and painful treatment for a disease acquired through the aberrations of others How can she be helped through the conflict of feelings that such a discovery creates? Certainly not by the giving of directions as to the need for treatment or for other physical measures Or consider the problem of the adolescent just about to face the working out of his own sex adjustment, who is found to have syphilis acquired from his parents More than medical care is needed for such a child

Whether the physician who discovers the in fection goes on or not with the treatment, he has to deal with the first reaction It is as important for the clinic to know the nature of this first handling as it is to know the source of infection. The patient's emotional reaction to his disease is more important than his intellectual awareness of what is involved in treatment One would like to know the whole train of events that have cul minated in his becoming infected At the time when he comes for care he is most ready to stop and consider these things and perhaps accept the type of re-education that he needs Such handling of the whole personal problem might be a more effective public health measure than the mere providing of treatment and the discovery of foci of infection

There are, of course, basic defects in the total social situation that cannot be corrected all at once In seeking out the girl who infected him the patient was trying to satisfy a deep and natural need with which he had no other way of dealing In so doing he was the product of our confused cultural attitude which pushes young people toward sex expression and then denies them acceptable ways of satisfaction

Much attention has been given in recent years to the sex education of children With our strong faith in the concept that knowledge is power we seem to believe that young people by knowing the basic facts of sex will be protected against future difficulties in dealing with it There is no certain agreement as to how this knowledge should be given nor by whom, nor as to just how far this education should go Neither are we sure how we expect this knowledge to be applied It is generally accepted now by even the most con servative that it is wise to answer honestly the early questions of a child as to where babies come from The embarrassing query as to how the baby is planted in the mother's body is slid over in terms of its being an expression of love between the parents, and often it is from his more sophisti cated playmates that he learns the facts of inter course.

As the child grows sex continues to be presented in an idealistic way Knowledge of anatomy and physiology is given in dignified terms and the whole process of sex is described as a sort of controlled intellectual functioning that creates little temptation However the boy or girl hears, from less serious companions that sex activity is something more not a stately ritual but a lot of fun which he ought to find out about If he is a thoughtful child who has trust in his parents, he is puzzled and goes to them for aid They are gratified by his trust, but just how far do they dare to go in being honest with him? They know that their own sexual activity has not been all for procreation. They do not like to deny their child happiness but can they admit him to this type of pleasure, and if not, what of his faith in them? After all their care in education and building trust can they leave him at this point to find his way, with other puzzled adoles cents alone in the midst of possible disaster? In this crisis they often hurriedly seek the help of a doctor but he is just as inadequate One begins to wonder whether this type of education which so thoroughly lays the foundation but cannot take the step from the theoretical to the actual may be no better than the vulgar initiation of the streets which at least is practical.

But suppose a boy knows all the facts and has avoided the pitfalls of early involvement and dis tortions He reaches late adolescent years, in experienced but instructed under internal pres sure to relieve a strong sex urge. How, even then is he to adjust his sex desires to the realities of the

social scene? Our present situation is bound to create for him a serious problem He has been helped to understand sex theoretically and has been relieved to a large extent from guilt over having sexual yearnings Our literature and theatre have held up not only the virtues but the glories of romantic love which must not be denied, even at the expense of others Advertisements have stimulated his imagination by showing almost nude women, wearing a minimum of intriguing underwear Magazines parade a profusion of girls in provocative postures quite different from those in the anatomy books He has been well cared for physically and his vitality and virility are high He has imbibed the traditional American attitude of aggressive reaching out for what he wants His moral code is vague, particularly about sex, and is constantly being weakened by newspaper reports of licentious behavior He is not ready to assume the burden of supporting a family His sex urge demands satisfaction But then, society, having pushed him to this point, denies him any legitimate way of self-gratification With this sort of preparation, he is not likely to be willing to lead a life of continence nor to confine himself to autoerotism until he marries Houses of prostitution have been banned, street prostitutes have been prohibited He may, nevertheless, find some resources of this sort or turn to homosexuality But he inevitably turns to the girls he has known socially, and among them he is least safeguarded against venereal disease The fact is that we have not found an approved solution to the problem of how young men are to manage their sex lives, and it is certain that venereal disease will abound when only surreptitious promiscuity is the rule

When he is infected and comes for treatment, all his frustration and guilt rise up to disturb him He does not think then of the total situation but only of his own shame and panic To some, this punishment is almost welcome, since they have carried, even during their apparently heedless conduct, a sense of wrongdoing It is possible that some have unconsciously invited this punishment, failing to take familiar precautions, but most have taken a gambler's chance rather than deny themselves All have been satisfying a biologic urge which society, although its existence depends upon its satisfaction, has denied a better outlet

The physician, then, who deals with a venereal disease patient must recognize that the problem before him is not simply a medical one His patient has failed not only to protect himself against disease but has also failed to find a solution to one of the great problems in his life He needs help, not only physical but mental At the least, a certain amount of individual attention is needed, and certainly his relation to his doctor is of great importance Doctors themselves, to be of real help, would do well to watch their own reactions, lest they become callous or harm the patient through too ready condemnation They cannot afford to forget that, while people may be careless or may unconsciously seek punishment, while they may be innocent victims, or ignorant, in any case their infection is not entirely their own fault but the result of a confused social situation Treatment of venereal disease must go beyond the physical, it must include a study of the patient as well as of the infection Perhaps some day the public clinics will provide adequate social and psychiatric facilities for the care of each patient For greatest effectiveness they would have to turn their attention not only to the original source of the infection but to the original way in which the infection was discovered—to the doctor who first dealt with the patient, who set the patient's attitude toward treatment, and to whom the patient may turn for interpretation of the clinic handling Until then, each physician who treats a case of venereal disease can help not only the individual but the total program of venereal disease control if he will take such time as he can find to consider for the patient the whole life story that led to the infection, and even more carefully, the attitudes within himself which may make the experience a truly constructive one for the patient, and so for the whole public

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RULE EASED ON CANCER OPIATE

Metopon hydrochloride, a painkilling drug used in cancer cases, is being made available more readily to physicians, the Treasury has disclosed The drug is not a cure, only an aid in relieving pain A morphine derivative, it was developed about a year ago by the National Research Council Previously it could be obtained only by physicians on direct approval of the United States Public Health Service Hereafter, the Treasury said, it will be available to wholesale drug dealers, hospitals, druggists, and physicians The drug may now be used for relief of any serious chronic pain requiring an opiate

ACCIDENT PREVENTION IN MEDICAL PRACTICE

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(Medical Director North Atlantic Area American Red Cross)

WHEN Mary S , aged seven, developed signs of residual rickets, the family doctor was not happy about it Of course, he was in nowise blamed by the parents, but vaguely and tormentingly there was in the back of his mind the question as to whether or not he had been sufficiently alert to the nutritional needs of Mary, whom he had attended off and on since she was born That was to his credit, and it reflected the growing sense of responsibility which physicians feel for protecting the health of the family as well as caring for them when they are sick Pediatricians, with their concern about immunizations, nutrition child training, and so on led the way They more than any other group of doctors, established preventive medicine as an important function of the physician, whether he practices a specialty or general medicine.

The responsibility for preventing accidents, a potent cause of injury and death has not yet impressed itself upon most physicians Considering that the results of accidents are just as deadly or damaging as disease, that accidents occur largely in the home, and that most of them can be prevented the physician's apparent unconcern about accident prevention is odd if not inexcusable and inconsistent Thoughtlessness ineptness and inexperience of the individual account for the great majority of accidents Safe ways of living can be made easier and surer by the foresight and conscious planning of those who serve human needs For example, safety engineers have distinguished their profession by their success in discovering and removing hazards in industry Architects now 'blueprint safety into the dwelling Designers of household appliances strive constantly to make them *accident-proof* Similarly, it devolves upon the physician who is intimately close to people and who has the run of the house so to speak, to add his share in preventing accidents He is in a strategic position to do this—more so than any other craftsman serving the family

What are his special advantages and responsibilities? He has the confidence of his patients, and he speaks the words of authority He is a trained observer and 'sees potential dangers more readily than others More important still, he has special knowledge concerning certain contributory factors responsible for accidents. The factors are physiologic and psychologic in nature. Among the former are vision defects such as astigmatism poor coordination of the two eyes inadequate peripheral vision, undue reaction to glare, hearing defects, muscular disturbances, and faulty muscular coordination. Also to be considered are arterial hypertension and organic diseases which may lead to dizziness or aberrations of sensibilities Fatigue, a common symptom of thyroid disorder, tuberculosis, and malnutrition, is a recognized contributing cause of accidents Excess of food and, of course alcohol in its immediate and carryover effects may lower the threshold of safety These are pathologic states which have accident potentialities and the least the physician dealing with any of them can do is to caution the patient against undue exposure to hazards

The psychologic conditions which may contribute to accidents have had all too little consideration. Emotional upsets are likely to affect judgment and muscular coordination Worry, loss of sleep, periodic emotional fluctuations, and neuroses, all play a role in the tragedy One wonders how many serious accidents especially among adolescents are due to a certain bravado which may be simply a form of exhibitionism * Defiance and hostility may lead to recklessness and then to a serious accident In the treatment of all such conditions the medical advisor should not forget the possibility of accidents and should take steps to guard against them

Certain drugs and medications have their peculiar effects Sedatives of all kinds tend to blunt sensibilities or to disturb judgment Quinine in large doses may be very distracting Sulfa drugs may give rise to odd sensations dizziness, or apathy Pupil dilators cause temporary vision distortions When using or prescribing any medication that may have marked physiologic effect the patient should certainly be forewarned and instructed Even that might not be enough those responsible for the care of such persons, parents nurses caretakers, should be instructed in what to expect and cautioned to be particularly alert in guarding against hazards which the patient, under the influence of the medication may not sufficiently appreciate himself

Probably the physician's efforts to prevent accidents are most fruitful in dealing with people at the two extremes of life young children and the aged Is there any reason why the family

Of the 3*7 deaths among th age group ten to fourteen in 1945 in New York State 162 were recorded as due to accidents 134 of these deaths were boys and only *8 girls

doctor should not take the mother of children on a tour of inspection in her own household from garret to cellar? He may begin by opening the ubiquitous "medicine cabinet" in the bathroom and point out the dangers there—antiseptics, leftover medicines, caustics, attractive looking pills, etc He may look into closets for the discovery of cleaning solutions and powders where itchy little hands can reach them In the kitchen he looks for threats from open flames, hot water and steam, electrical appliances He notes where knives and ice picks and scissors are stored, shows how utensils should be placed on the stove out of reach of young explorers In the living room there may be rugs that slip, an unguarded fireplace, furniture that may easily topple In the playroom may be treacherous toys such as bows and arrows, dart games, tacks, pins, marbles, and innumerable articles begging to be put into the mouth or poked into the nose of a curious toddler On the cellar steps there may be jars, overshoes, mops, and washboards Almost anywhere in the house the alert searcher may find defective electrical fixtures The doctor may wish to advise that a gate be placed on this stairway, a guard on that window, a special closet for cleaning materials, and so on Such a search in the immediate environment of his charges for accident breeders may not be traditional medical practice, but it can become as challenging as the search for disease breeders through the physical examination which is accepted practice Insisting that a defective electrical fixture be repaired is just as valuable a service as urging that a pair of diseased tonsils be removed To the victim it makes little difference whether his discomfort originates from within or without

A by-product of such an "environmental inspection" is that the members of the household are educated to the needs of safety practices Not only safe "things," but also habits and practices they learn are needed to guard against accidents Most people must have their attention directed to hazards before they recognize them, they must be stimulated to become safety-conscious How can that be done better than through a demonstration by the one friend of the family who is known to be concerned about the well-being of the family

The care of the aged is receiving increasing attention Physicians interested in geriatrics are discovering more and more ways of making the sunset period of life more mellow and enjoyable Old people are particularly accident-prone In one year (1945) 77 per cent of the victims of fatal falls in the United States were sixty-five years of age or older [1] That is but one index of the accident threat to elderly people The reasons for this are obvious enough As perceptions are gradually blunted, as reactions are slowed, as once supple joints become stiff, escape from accidents becomes less certain Good household planning can help to safeguard grandfather The fewer stairs there are to climb, the better He needs handrails on the stairs He should have a flashlight for use at night There should be no slippery floors or loose carpets Toys and other objects should not litter the floor Medicines should be controlled Thoughtfulness on the part of the rest of the family is a grace to be cultivated. The young and robust easily forget the handicaps of age and express their impatience, not with sadistic intent, of course, but with cruel effect nevertheless, both physically and emotionally As an interpreter of how older people feel, how they react, what special care they need, and so on, the doctor performs an invaluable service, not only in safeguarding the aged against accidents but also in making their lot generally more cheerful and happy The doctor knows, as no one else, how certain pathologic conditions common in old age may affect physical and emotional reactions Only he knows how certain drugs will condition these reactions Along with his instructions to the aged patient, he needs to inform the family also as to what to expect under certain circumstances

It is hoped that these somewhat random thoughts may stimulate the physician to think more seriously of accident prevention Perhaps what we need is more precise information on how accidents occur As Osler always emphasized the etiology of disease in his "*Practice of Medicine*," so should we make searching inquiry as to the direct and predisposing causes of injuries resulting from accidents Some real research work is indicated in the field of pediatrics, surgery, geriatrics—in fact, in all branches of therapeutic medicine Our general knowledge, as public-spirited citizens, should be sharpened, made more precise, so that we, the medical profession, might take our place of leadership in the professional aspects of accident prevention, for accidents do seriously impair health and cause death, and 90 per cent of all accidents, we are told by the National Safety Council, are preventable In New York State alone there were 8,069 fatal accidents in 1946, and nearly one-half occurred in the home

Reference

1 National Safety Council Accident Facts. Chicago, 1946

MEDICAL TREATMENT OF MÉNIERE S SYNDROME

JOHN J RAINEY, M D , Troy, New York

(From the Troy Hospital)

THIS report is concerned with the results obtained by the intravenous use of histamine phosphate over a period of seven years in patients who are the victims of the symptom complex called Ménière's syndrome.

Since 1940, we have treated 121 patients at the Troy Hospital by means of intravenous histamine phosphate The results were excellent in about 83 per cent of the cases The condition was more frequent between the ages of thirty-eight and sixty-five, with women predominating and the best results were obtained with this age group In those patients who received immediate relief there was a return of symptoms in about 25 per cent of the cases The symptoms recurred within a few weeks or months, and many of these were given a second or third series of treatments In this group were three patients who obtained prompt relief but later went elsewhere for section of the auditory nerve. The outcome following nerve resection will be taken up later

It is believed that the attacks of Ménière s syndrome are brought on by a local disturbance of the inner ear due to a release of histamine. There is no positive evidence of the purpose of histamine, and it would appear that there are other substances that are in a measure responsible for allergic reactions [1] This may be an explanation for the failure of histamine intravenous therapy in some patients who have severe and unmistakable symptoms of the syndrome

Some writers wish to substitute the term labyrinthine hydrops for Ménière s syndrome. However it is a highly significant term, understood by all and not easily confused with any other condition The basis of the syndrome is unilateral or bilateral nerve deafness, accompanied by tinnitus, and with "objects spinning about the patient or "the patient spinning about the objects the attacks being complicated by nausea or vomiting It would therefore, seem best to hold fast to the time-honored and euphonic term Ménière s syndrome, and not be led down the devious pathway of labyrinthine hydrops.

It is well to bear in mind that the earlier a patient is treated by histamine intravenously the more certain the cure With patients who have been afflicted for several months or a year or more, it is hardly to be expected that the majority will respond to the treatment It is true that most patients get well with the passing of time but economic disaster faces the patient who is incapacitated for many months by attacks The physician assumes a grave responsibility in those cases which do not respond readily to oral or subcutaneous treatment

As already pointed out, all early cases do not respond to intravenous treatment but most of them do The histories of two cases are given and the happy results are due to their physicians, who prescribed early intravenous therapy

Case Reports

Case 1 —The first patient was a man of 50 a manager of a large manufacturing plant. His first attack occurred January 25 1946 It was a severe major attack, and he was rendered helpless because of the vertigo He had almost unbearable intermittent ringing in his ears, as well as vomiting Within the next few days he had two more attacks On February 2, 1946 he consulted Dr Clement J Handron, of Troy New York, and while in Dr Handron s office was stricken with a major attack. He was taken to the Troy Hospital by ambulance and was put on a low sodium diet and given ammonium chloride. There was no improvement and on February 8 1946 he was given the first of a series of three intravenous histamine treatments the technic of which is described elsewhere.[2] After leaving the hospital he attempted to carry on his executive affairs but found himself unsteady at times He remained away from business for three weeks and has been well ever since.

Case 2 —A clerk, aged 34, a patient of Dr Matthew J Keough of Cohoes, New York, volunteered for Army service and was twice rejected because of bilateral nerve deafness. His third attempt to enter the service was successful, and he was assigned to a southern state. He became an artillery instructor After two years he was discharged from the service because of a marked increase in his deafness and was given 10 per cent disability This was later revoked because after a casual examination it was felt his hearing had improved He was then given 10 per cent disability for an arthritic condition. On the morning of September 16 1947 he had an attack of vertigo and fell to the floor He was helpless for two hours. Since then, if the patient turned his head to the right he would bring on an attack and was in danger of falling Showing no improvement with the usual remedies he entered the Troy Hospital on September 26 1947 and three days later was given the first of three intravenous histamine treatments Following the treatments, he could turn his head to the right without any suggestion of an attack Three weeks later he returned to work

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Presented by invitation at the taff meeting of the Mary McClellan Hospital Cambridge New York April 1 1948.

These two patients in different age groups suffered from major attacks of the syndrome Each had bilateral nerve deafness, the left ear being more involved Movements of the head had little effect on the older patient, turning the head to the right brought on an attack in the younger man The first patient had some warning of an attack and could save himself from falling, while an attack instantly felled the younger man The fact that neither patient was of the neurotic type played an important role in the good results

Three of our patients who had an arrest of attacks for several months went elsewhere for nerve section on the recurrence of some of their symptoms

Case 3 —A teacher, aged 47, with bilateral nerve deafness, was first treated in July, 1943 She was free of attacks until December, 1943, when she was treated again She carried on her duties and in May, 1944 received another series She was advised that her side symptoms were due to the menopause and that in a year or two she would be quite well However she went to a large clinic, and a section of the right vestibular nerve was performed Until a year ago she had shown no improvement

Case 4 —A woman, aged 40, a white collar worker with bilateral nerve deafness, was thrown to the floor on November 17, 1944, while at work on a stepladder Following the accident, she complained of headache and unsteadiness An x-ray showed a small fracture through the left mastoid bone In May, 1945, she began to have major attacks of the syndrome, and it was necessary on more than one occasion to remove her to her home by ambulance In October, 1945, three intravenous treatments of histamine were given at the Troy Hospital She remained free from attacks for five months The attacks recurred, and she was given another series of treatments

In August, 1946, her symptoms again returned, and she went elsewhere for nerve section Six months passed after the section of the right auditory nerve before the symptoms abated For more than two years, the patient, who was highly emotional, had the additional disturbing factor of being in and out of compensation court A few months ago, her lawyer, who made a special study of the syndrome, was rewarded with a decision in favor of his client She was awarded 66 weeks salary and 100 per cent disability for the deafness that resulted from the section of the auditory nerve The patient is now free from vertigo, but a period equal to that following histamine therapy was required

Case 5 —This young woman of 18 suffered from bilateral nerve deafness, the left ear being more affected She was first examined on November 23, 1945 The previous year she had had a major attack of the syndrome and fell to the floor and remained helpless for four hours For the three weeks before coming to us she had had severe attacks every day or two She received intravenous therapy during the last days of November, 1945 She was free from symptoms for several months She then had attacks of vertigo on and off that lasted for from one minute to one-half hour On January 21, 1947, section of the left eighth nerve was done She married several months later and up to the present has had no major attacks

Case 6 —A woman, aged 56, was first seen on July 19, 1947 She had a section of the eighth nerve performed on April 30, 1935 This was several years before the introduction of histamine as a therapeutic in Ménière's syndrome Before operation she suffered from attacks for a period of six weeks Following operation on the left ear, the vertigo ceased, the tinnitus diminished, and total deafness in that ear was an after-effect Five and one-half years later there was a recurrence of the vertigo but less severe than before the operation This lasted about two months and then disappeared For two weeks before her visit to the office on July 19, 1947, she had been having attacks just as severe as those before operation During the original attacks, objects rotated about the patient Now objects no longer spin about her, but she has a sensation of levitation She feels as if she is being whirled on ascending spirals Prior to the nerve operation twelve years ago, she got some relief by lying flat, but now the vertigo is aggravated by that position She was given sodium bromide, which seemed to control the major attacks She returned to work in a few weeks For a month or so it was necessary for her to get into and out of bed slowly and carefully and not to retract the head. Now, six months later, she no longer takes medication of any kind and is symptom free Although this patient has now a moderate degree of nerve deafness in the right ear the return of symptoms may be remotely due to a regeneration of the severed vestibular fibers of the eighth nerve on the left side Intravenous histamine therapy was not used in this case because the patient responded so promptly to sedation

Several patients before coming to us had received benadryl The drug had had no effect on the major attacks and only resulted in making the side symptoms worse One patient who suffered from severe major attacks of the syndrome had been given benadryl and pyribenzamine over a period of several months She reacted so poorly following intravenous histamine therapy that further treatment was postponed for several weeks Some patients are extremely hypersensitive to benadryl, as shown in a recent report of a patient who developed sharp attacks that simulated Ménière's syndrome from the administration of this drug [3] It would be well for the physician who contemplates intravenous histamine therapy to be certain that none of the side symptoms of these new and popular drugs is present

Comment

Until the advent of intravenous histamine phosphate a decade ago, there was no therapeutic agent to brighten the lives of many patients

afflicted with Ménière's syndrome Some of them developed a sullen disposition which set them apart from their friends

We know that most patients get well without treatment or with aid of sedatives which tend to bridge over emotional crises It is our belief that only about one patient in seven requires intravenous therapy

Three of our patients had auditory nerve section, and only one showed real improvement Total deafness resulted in the ear operated on in all three. Another patient had a nerve section twelve years ago, with return of symptoms five and one-half and twelve years later It would appear from this experience that section of the eighth nerve is rarely, if ever advisable.[4]

The new drugs, benadryl and pyribenzamine should be used cautiously in Ménière's syndrome, if at all, as they have the effect of confusing the issue

The salt-free regimen plus ammonium chloride, has proved to be of no benefit in our experience and with histamine used subcutaneously can be considered only as a valuable placebo

Conclusion

The administration of histamine phosphate intravenously for this syndrome or other conditions is time consuming[5] It takes at least one and one-half or two hours of the physician's time for each treatment, which should be carried out in a hospital under careful supervision However, the physician will be well rewarded by grateful patients, the majority of whom will respond to his efforts. If the physician's diagnosis of Ménière's syndrome is correct, he will have in histamine phosphate used intravenously the best treatment at the present time

17 SECOND STREET

References

1 Duggan, W F Arch. Ophth. 36: 551 (Nov.) 1946.
2 Rainey J J J.A.M.A 122 850 (July 24) 1943
3. Swarts IL: NEW YORK STATE J MED 48: 88 (Jan. 1)1948.
4 Rainey J J : *Ibid* 45 1753 (Aug 15) 1945.
5 Thomas, W A. and Butler S. Bull. New York Acad. Med. 22: 125 (March) 1946.

The author is greatly indebted to Crawford R. Green, M D F.A.C.P of Troy New York for helpful suggestions

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ON THE CONFIDENTIAL REPORTING OF CAUSES OF DEATH

Some physicians may be reluctant to report on the official record a cause of death which may reflect unfavorably upon the memory of the deceased On the assumption that the official statistics for such causes of death, particularly alcoholism and syphilis, would thereby be improved a confidential method of reporting was inaugurated as an experiment, in the Borough of Manhattan, New York, January 1 1939 The confidential method differs from the open method previously used (and still used everywhere else in our country) in that the physician's medical report is made on a separate form and is not released with the copy of the death record. In 1943 the New York City Department of Health initiated a study of the statistical efficiency of the confidential certificate. The conclusion drawn from that investigation recently completed is that to date, the use of the confidential death certificate has had no significant effect on the accuracy of mortality statistics in New York City

The study included an intensive analysis of the case histories of 7 330 persons who had died in hospitals in 1937–1938 (when open reporting was in use in all boroughs) and in 1939–1941 (when confidential reporting was in effect in Manhattan) The primary cause of death as determined from hospital diagnoses was compared with the primary cause as reported on the death certificate For most causes including cancer the two sources were in substantial agreement. On the other hand five causes were understated on death certificates according to the hospital records These causes together accounted for about one seventh of all the deaths

A review of the data for the understated conditions reveals no evidence that more accurate statistics resulted from the use of the confidential death certificate. Only about one half of the deaths due to alcoholism were so reported, whether the open or the confidential certificate was used. Improvement in the reporting of the mortality from syphilis was noted in all boroughs This no doubt reflects the intensive educational and clinical programs which were launched in New York in 1935 to bring syphilis under control The findings are basically similar for the other understated conditions

Judged by the findings from this study the confidential method does not improve the accuracy of mortality statistics. In fact no method of reporting, of itself can be expected to eliminate all the factors which impair these statistics. Carelessness, ignorance of the rules of certification, and lack of understanding of the mechanisms of death have a greater bearing on the information that is recorded than does the method or the physician's unwillingness to record causes of death to the best of his knowledge —*Statistical Bulletin June 1948*

Case Reports

PALINDROMIC RHEUMATISM

SELVAN DAVISON, M D , New York City

IN 1941 and 1944, Hench and Rosenberg published an account of a new syndrome they called palindromic rheumatism (from the Greek "to run back") which includes the following features Multiple afebrile attacks in an adult of either sex of acute arthritis, periarthritis, and sometimes para-arthritis, with pain, swelling, redness, and disability generally of only one, but sometimes of more than one, small or large joint They appear suddenly and develop rapidly, usually lasting a few hours to several days and recur at short or long irregular intervals, without any accompanying constitutional reaction and with complete functional restitution of the affected joints The sedimentation rate is normal or, at most, relatively and transiently elevated Despite the frequently large number of recurrences, not only is function always completely restored, but repeated x-rays over a period of years reveal no pathology in and about the affected joints There is no connection with season and weather Salicylate therapy gives very little or no relief The prognosis is guarded, inasmuch as Hench and Rosenberg found 15 per cent spontaneous cures, 44 per cent improved, 26 per cent unchanged, 11 per cent worse, and 4 per cent (one patient) dead of intercurrent disease [1 2]

Since the first report in 1941, which included 34 cases, there have been only scattered articles and case reports on the subject Nelligan remarks that the first British publication of the entity palindromic rheumatism was in 1945 [3 4] Apart from Hench and Rosenberg's cases, this writer has found only 11 others in the literature Although it is apparently not a very common cause of rheumatic disorder (5 to 6 each year out of 4,000 to 45,000 cases of rheumatism seen at the Mayo Clinic), it presents itself often enough so that it should be more readily considered in the differential diagnosis, particularly in the puzzling cases A great deal of time and money may be spent in repeated treatment with physiotherapy, allergy desensitization, various injections, and other methods, despite obvious failure of therapy, unless the correct diagnosis is made, for palindromic rheumatism has not as yet responded specifically to known therapeutic measures

The following case is reported in an effort to further stimulate recognition of this interesting syndrome

Case Report

G S J , a 51-year old white man, a civil engineer, first began to have arthritis eleven years ago As a child he had had scarlet fever, diphtheria, and measles A tonsillectomy was performed thirteen and again ten years ago He was otherwise well until eleven years ago when he first noted acute pain in various joints at irregular time intervals, usually involving no more than one or two simultaneously (large and small) and continuing from several hours to three to four days Swelling, pain, tenderness, redness, and heat without fever or malaise were associated with each flare-up, and, following each episode, the joints were without any noticeable change or loss of function One and one-half years ago, while in the Navy, he began to have more frequent and more severe bouts of arthritis, involving the left knee and both hands He was admitted to the Bethesda U S Naval Hospital A complete work-up revealed constant normal temperature, normal sedimentation rates, normal blood count and differential white count, and normal blood uric acid (3 0 and 3 3 mg per cent) X-ray examination of the paranasal sinuses showed them to be clear throughout X-rays of both hands revealed no evidence of bone or joint pathology Physical examination apart from the transient arthritis was normal A series of allergy skin tests was performed and resulted in moderate reaction to house dust, silk, wool, orchard grass, timothy, short ragweed, and Staphylococcus aureus Hyposensitization was carried out with house dust, mixed bacteria, and mixed grasses

He was comparatively free of attacks until eight months ago, when episodes of arthritis recurred and have continued to the present, despite varied regimens of therapy and many diagnoses The writer first saw the patient two months ago during a severe attack involving the left wrist and the fingers of the left hand During the previous month there had been almost constant recurrence of pain and swelling in many joints The severe episode during which he first presented himself was while on intensive salicylate therapy He had with him the abstract of his Naval hospitalization, and I was struck by the findings of normal temperature and sedimentation rate during acute attacks and by his appearance of general good health

Physical Examination —The patient was a well-developed, well-nourished, active white adult He favored his left upper extremity, and examination revealed the fingers of the left hand to be red, hot, swollen, tender, and painful on motion No other joints were involved The blood pressure was 120/76 The heart and lungs were normal, as were temperature, pulse, and respiration

Laboratory —The erythrocyte sedimentation rate was 18 mm fall in one hour, by the Westergren method Hemoglobin was 90 per cent (Sahli), white blood count 6,250 per cu mm., differential white blood count, 60 per cent polymorphonuclear, 30 per cent lymphocytes, 1 per cent monocytes, and 1 per cent basophil cells Urine analysis was negative Blood Mazzini reaction was negative An electrocardiogram was essentially normal. X-rays

of the wrists hands and left shoulder revealed completely normal bone and joint structures

Course.—The acute attack had hardly subsided when he was seen again six days after his first visit, with severe arthritis and periarthritis of the left hand. This occurred during intensive salicylate treatment. The seizure lasted two days, and after two days freedom there was a flare-up in the right hand and wrist. He has been seen at varying intervals since then and has had constantly repeated episodes most often in the left shoulder, the wrists and fingers although the symptoms have diminished in severity. A complete blood count and a sedimentation rate during this period were found to be normal. A blood uric acid was 1 6 mg. per cent.

Therapy.—As has been mentioned above salicylates in full doses were of no help nor was heat in various forms. The allergy desensitization carried out by the Naval hospital was questionably helpful in that he was moderately free of symptoms for about eight months. During the past year he has had numerous and varied forms of treatment directed either at the arthritis or systemically or both, and no measure has been successful. The lack of response to any form of therapy is a point in favor of the diagnosis of palindromic rheumatism.

Hench and Rosenberg state that, despite certain similarities, the disease they described differs from that in the article by Kahlmeter [5]. In the latter an allergic factor was considered the cause but Hench and Rosenberg are not prepared to accept palindromic rheumatism as allergic in nature. However pyribenzamine in doses as high as 200 mg. in four hours was tried several times in this case. During one attack the patient reported he thought he had obtained some relief coincidentally with taking the pyribenzamine. The known proclivity of this disease of acute episodes to be sudden and short-lived casts great doubt upon his observation.

Summary

A case has been presented of recurrent acute arthritis in an adult man, with history course laboratory and x-ray findings that would seem to place it in the category of palindromic rheumatism.

120 EAST 70TH STREET

References

1. Hench, P. S. and Rosenberg, E. F.: Proc. Staff Meet. Mayo Clin. 16: 808 (1941).
2. *Idem*: Arch. Int. Med. 73: 293 (1944).
3. Neligan, A. R.: Brit. M. J. 1: 705 (1946).
4. Wingfield, A.: *ibid.* 2: 157 (1945).
5. Kahlmeter, G.: Acta med. Scandinav. 102: 432 (1939).

STATE DEATH RATE SHOWS THIRTY PER CENT DECLINE

New York's death rate has dropped more than 30 per cent in the last half century, Dr. Herman E. Hilleboe, State Health Commissioner, reported recently that there were 11.1 deaths per 1,000 population last year compared to 17.2 in 1897.

The decline, he said, was due largely to progress in control and prevention of the communicable diseases of childhood.

On the other hand, mortality from chronic diseases of middle life and old age has increased as the average age of the population moved upward, Dr. Hilleboe stated. In 1900 heart and blood vessel ailments caused 371.8 deaths for each 100,000 of population. By last year the rate was 544.6 per 100,000.

Fifty years ago, Dr. Hilleboe said, the diseases of childhood claimed 15,000 lives annually in the State. Last year this mortality was less than 500.

RADIOACTIVE SPOTTING METHOD USED TO LOCATE BRAIN TUMORS

Brain tumor detection by means of a radioactive dye that becomes concentrated in these abnormal growths and can be detected through skull and skin with a Geiger-Muller counter is the newest medical development in the use of atomic-pile by-products.

It has been tried out successfully in a dozen cases at the University of Minnesota Medical School and is reported in *Science* (May 28) by Dr. George E. Moore, senior research fellow of the U. S. Public Health Service.

It was already known that a dye called fluorescein has an affinity for tumorous tissue. To render it radioactive Dr. Moore chemically tacked on some radioactive iodine, converting it into diiodofluorescein. Small, calculated quantities of this were injected into the veins of patients suspected of having brain tumors who were to undergo operations.

In a short time the blood had been carried to their heads where the counters detected the presence of the radioactive atoms. Some of the iodine was present all over the brain, but on the patients' heads there were certain spots where the counters ticked much more rapidly than they did elsewhere. This was taken as indicating the possible presence of a tumor beneath that spot on the skull.

Subsequent operations proved the radioactive spotting method to have been correct in a large proportion of the cases.

The method is not considered infallible and is to be used only in connection with other methods of diagnosis. So used, however, it should be helpful.

FATAL AGRANULOCYTOSIS FOLLOWING INGESTION OF AMINOPYRINE

SIDNEY LEIBOWITZ, M D , New York City

(*From the Medical Service, Beth Israel Hospital*)

EVER since Schultz presented four cases of agranulocytosis in 1922 and described the clinical picture in detail, increasing interest in this disease has been evidenced [1] At first the literature was occupied with numerous case reports corroborating Schultz's description [2] Then, with the presentation of careful bone marrow studies, it became generally accepted that this truly was a disease entity, although even to the present day there is still strong disagreement with the more generally accepted theory of pathogenesis of maturation arrest of the myeloblast cell stage [3-10] In 1934, Madison and Squier pioneered in the question of the cause of the disease with their presentation of 14 cases all of which had received aminopyrine [11] Subsequently, and continuing to the present, the evidence establishing aminopyrine as a causative factor (although not the sole one) has steadily increased [5 6 12-14]

The case being reported herein is one more instance of fatal agranulocytosis where aminopyrine had been ingested It is being presented, however, because it has several additional interesting features (1) a new drug (Subenon) had been taken by the patient, and, until it became known that aminopyrine entered into the picture, this drug excited great suspicion as the possible cause of agranulocytosis, and (2) diphtheria bacilli were found in the throat culture

Case Report

History —N G , a 60-year-old white woman, was admitted to Beth Israel Hospital on April 13, 1946, with a known five hours history of fever, sore throat, and rash. The patient was first observed five hours before admission, when no satisfactory history was obtainable because she was alone and toxic, mildly disoriented, edentulous, and hoarse By sign language, she indicated pain in the neck and throat and by writing she indicated that she had been ill for three days with sore throat She also indicated that she had taken five aspirin tablets daily with sodium bicarbonate during the four to five days prior to admission Her occupation was serving as a baby's nurse

Physical Examination —On admission the patient was acutely ill, flushed, dyspneic, and breathing with obvious obstruction in the throat She was dehydrated and extremely hoarse. Over the skin of the abdomen, anterior chest, and breasts, there was a macular eruption consisting of irregular, pale red areas measuring up to 1 cm in diameter, all of which faded on pressure Four of these macules bore tiny, rounded, nodular, hemorrhagic centers which did not fade on pressure Two macules were noted on the forearms The tongue was dry and boardlike Temperature was 104 F , pulse 120, and respirations 32 Blood pressure was 140/80 Nasal mucosa was reddened without pus in the nares The soft palate and uvula were markedly edematous There was a grayish slough on both tonsils At the base of the tongue and over the lymphoid tissue was a large sloughing membrane Examination of the larynx showed a thickened and reddened epiglottis There was marked edema of the right side of the larynx about the right cord Both cords appeared reddened The right side of the neck was swollen externally with enlarged posterior cervical lymph glands The left posterior cervical glands were enlarged There was no episternal retraction The heart was negative except for the tachycardia Heart sounds were obscured by the mucous rales in the throat Lung fields were clear Liver and spleen were not palpable

Laboratory Data —Blood count done on admission revealed 4,500,000 red blood cells and a white blood count of 900, with segmented forms difficult to find in the smear

Course —The white blood count substantiated a diagnosis of agranulocytic angina The patient was given 100,000 units of penicillin intramuscularly every three hours She was placed on continuous intravenous fluids, alternately normal saline and five per cent glucose in saline She took little or no fluids by mouth, despite attempts to feed small quantities of warm fluids She required suction of the throat every ten to fifteen minutes and breathed more comfortably after each suctioning Tracheotomy was considered at the time of admission but was not performed because of relief by the frequent suctioning She was not cyanotic One blood transfusion with 500 cc of whole blood was performed Her course was down hill from the very start After twenty-four hours, the throat showed a large necrotic mass involving the right tonsillar area and extending to the uvula There were large sloughing areas at the base of the tongue The edema of the soft palate was diminished, but the edema of the right side of the larynx was unchanged There was room between the cords for breathing, but a large amount of mucus collected and had to be removed continually The macules described on admission were present on the skin of the back twenty-four hours later There was dullness over the right lower chest posteriorly with impaired fremitus Breath sounds were almost completely obscured by the coarse rhonchi from the mucus in the throat.

Blood count performed twenty-four hours after admission showed 800 white cells Sternal marrow puncture was performed forty hours after admission and revealed complete aplasia of white cell elements At this time, blood culture taken on admission was negative, and culture of the throat taken on admission showed Klebs-Loeffler bacilli Sixty-five thousand units of diphtheria antitoxin were administered intramuscularly, despite the fact that it was our clinical impression that the patient did not have diphtheria but was probably harboring the organism as a carrier Virulence test on the diphtheria bacilli was later reported as positive The patient expired forty-five hours after admission The immediate cause of death was toxemia from the throat infection which was undoubtedly secondary to the underlying agranulocytosis

Additional History —Following the death of the patient, it was discovered that during the month preceding her illness she had taken 1 or 2 Subenon* tablets three times daily Subenon consists of calcium

* Proprietary product of Seydel Chemical Company

double salt of benzoic acid and benzyl succinate.[13] This information temporarily excited our interest because of the possible relationship of the benzyl salt to the agranulocytosis. However further investigation revealed the following facts

On May 12, 1944, i.e. almost two years prior to the fatal illness, she had received 100 tablets of Causalin* and had renewed this prescription a month later. This latter bottle, still containing 82 of the Causalin tablets, was found in the purse of the patient at the time of her death. Evidence was unearthed that corroborated the suspicion that she had recommenced taking these tablets during the two weeks preceding death. Each Causalin tablet contained 1.82 grains of aminopyrine. The remaining listed ingredients per tablet were 1.82 grains of ethyl salicylate carbonate and 3.86 grains of 8-hydroxy quinoline 5-sulfonic acid.

Autopsy Findings

Gross Examination.—Skin bears numerous dark and pale red spots, the largest ones being in the front of the right axilla, in the fold under the right breast and in the left lower abdominal quadrant. The axillary one has a pale gray center. These lesions are flat and there is no grossly visible ulceration.

Lower half of left lower lobe of the lungs is atelectatic. Right upper and middle lobes are emphysematous. Right lower lobe is almost entirely atelectatic.

The tongue is coated throughout. In addition its base is partly covered with dark brownish-green friable masses, more so on the right side. The pharyngeal wall is severely edematous. In a few areas about 3 mm. in diameter the uppermost layers are yellowish and grayish-green, obviously necrotic. The piriform sinuses are much narrowed by edematous swelling of the mucosa, which is partly pale yellow, partly cyanotic. The right aryepiglottic fold in its midportion forms an ovoid yellowish-green, swollen, translucent mass measuring 1.5 by 0.8 by 0.8 cm. A similar condition of the tissues prevails in a tapering zone which has its upper end at the upper edge of the epiglottis on the right side. The left aryepiglottic fold is also considerably swollen. On the posterior surface of the epiglottis to the right a circular area 3 mm. in diameter is opaque yellowish-gray and protrudes slightly. A similar but irregularly outlined flat area, 8 mm. in diameter is situated near the right edge in the upper third of the epiglottis. The laryngeal mucosa above and below the ventricles also is edematous. The edema reaches down to the cricoid cartilage.

The rectum 8 cm. above the anus bears two slightly raised dull yellowish-gray areas about 2 mm. in diameter, surrounded by narrow red zones. Bone marrow in the upper third of the right femur is pale yellow, semifluid. The cut surfaces of the sternum are somewhat paler than those of the vertebrae (strawberry colored) and have a slight yellowish tinge.

Microscopic Examination.—Skin sections from the petechiae show tiny fibrinoid necroses involving the capillaries and small veins. Base of tongue section shows an extensive area of ulceration. Supplanting the desquamated epithelium is an edematous mass of fibrin in which remnants of necrotic vessels can be made out. At the base numerous fibroblasts are present as well as other mononuclear elements. Practically no polymorphonuclear leukocytes are present. Epiglottis section shows severe inflammation and edema. There is a similar ulcerated area in which much necrotic material can be seen. Here, too mononuclear elements are present at the base. Aryepiglottic fold sections show very marked edema with similar necrosis, ulceration and inflammation. Again, practically no polymorphonuclear leukocytes are seen. Pharynx section from the lateral wall shows a similar picture. A large area of necrosis is seen deep under a crypt. A small ulceration of the larynx is seen overlying the area of extensive edema. Rectum section shows a small necrosis in the mucosa and adjacent submucosa. There is little inflammation and what there is is mainly plasma cellular. In the femur the marrow is almost entirely replaced by fat. In the sternum, vertebra, and rib erythropoietic elements predominate. No cells of the myeloid series are found. Megakaryocytes are very numerous. Fairly numerous multinucleated cells with large nuclei and slightly basophilic cytoplasm are also present. Transitions between these and megakaryocytes are thought to be recognized.

Postmortem Bacteriology.—Throat cultures showed cocci of all kinds including streptococci and numerous yeast cells. No diphtheria bacilli were seen. Skin lesion and bone marrow were sterile. Staphylococcus albus was found in the heart blood.

Pertinent Final Anatomic Diagnoses.—Agranulocytosis; multiple necroses and severe edema in pharynx; superficial necroses base of tongue; severe edema of larynx; necroses, posterior surface of epiglottis; small necroses, rectum, and multiple hemorrhages in serous surfaces and skin were the final diagnoses.

Discussion

This case is a classic example of extreme sensitization to the drug aminopyrine. The mechanism involved in agranulocytosis is akin to anaphylaxis with an initial dose being necessary to sensitize the patient. Here the patient was initially sensitized twenty two months prior to the onset of clinical signs. The picture was explosively apparent when she recommenced the ingestion of her Causalin tablets. The dosages involved were characteristically small. Madison and Squier reproduced the picture with a 0.3 Gm. dose.[11] Witts has stated that the total dose commonly ingested prior to sensitization is 2.5 to 25 Gm. and that so long as an individual is susceptible as little as 0.2 Gm. may precipitate an acute attack.[12]

We feel justified in eliminating the Subenon drug as a causative factor. Because of its benzyl radical, it excited suspicion until the ingestion of aminopyrine came to light. Despite the vast evidence in the literature incriminating benzene derivatives, we believe that the Causalin is the likely causative agent.[14-19] This view is supported by the overwhelming number of reports both clinical and experimental, which have related aminopyrine to this

* Proprietary product of Amfre Drug Company.

disease etiologically and by the specific history eventually elicited in this case

The possibility of diphtheria entered into the differential diagnosis at the start but was rejected on clinical grounds The finding of diphtheria bacilli by throat culture was, therefore, a surprise Diphtheria antitoxin was administered on empiric grounds, but we feel we were dealing with a carrier The similarity between the oral lesions in diphtheria and agranulocytic angina has been emphasized by Gordon and Litvak.[20]

This case demonstrates that the doctor must often assume the role of a fact-finding detective It required painstaking investigation to piece together the history (most of it done postmortem) which made clear the probable clinical chain of events Fitzhugh has said " in this connection [suspecting and proving aminopyrine ingestion] it is important to emphasize the fact that an accurate history of previous medication is often very difficult to obtain and real 'detective work' is sometimes necessary to lead to the truth."[6]

Summary

1 A case is reported of fatal agranulocytosis following ingestion of aminopyrine in a 60-year-old woman

2 The case presents three especially interesting features a history of ingestion of a relatively new drug, Subenon, the growth of diphtheria bacilli on throat culture antemortem, and the "detective work," particularly postmortem, which was necessary to align an accurate history This history, as compiled, strongly suggests aminopyrine as the causative agent

55 EAST 86TH STREET

References

1 Schultz, W Deutsche med Wchnschr 48 1495 (1922)
2 Roberts S R., and Kracke R. R. J A M A 95 780 (1930)
3 Custer, R. P Am. J M Sc 189 507 (1935)
4 Darling R C , Parker F and Jackson, H. Am. J Path. 12 1 (1936)
5 Fitzhugh, T Ann Int. Med. 8 148 (1934)
6 *Idem.* M Clin North America 19 103 (1935)
7 Fitzhugh, T , and Krumbhaar, E B Am. J M Sc 183 104 (1932)
8 Jackson, H and Parker F New England J Med. 212 137 (1935)
9 Roberts, S R., and Kracke, R R. Ann. Int. Med 8 129 (1934)
10 Rosenthal, N Am J Clin Path 1 7 (1931)
11 Madison F W and Squier, T L. J A.M A. 102 755 (1934)
12 Dameshek, W and Colmes A. J Clin. Investigation 15 85 (1936)
13 Witts, L. J Brit. M J 1 1061 (1936)
14 *Ibid* 2 211 (1936)
15 Gubner, R., and Szucs M New England J Med. 233 652 (1945)
16 Hamilton A Arch. Path 2 434, 601 (1931)
17 Kracke, R. R. Am. J Clin. Path. 1 385 (1931)
18 *Ibid.* 2 11 (1932)
19 Parker F P , and Kracke R. R. Am. J Clin Path. 6 41 (1936)
20 Gordon M B , and Litvak, A. M M J & Rec 131 35 74 (1930)

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THIRTY-FOUR NEW HORMONES DISCOVERED

Discovery of 34 male hormones that may provide a clue to the cancer mystery has been announced by Dr Cornelius P Rhoads, director of Memorial Hospital and Sloan-Kettering Institute of New York.

The hormones were identified during tests seeking to "pinpoint" the cause of cancer, Dr Rhoads told more than 800 medical specialists at the American Urological Association's annual meeting in Boston in May

Researchers had already found "promising" evidence linking the disease with the faulty manufacture of these homrones, he said

Although statistical data were still inconclusive, Dr Rhoads said that the "possibility was good" that eventually the research would uncover the specific element in body chemistry that causes cancer With that information, he said, positive control of the disease would be in sight

Concurrent research on the hormones had also indicated there might be strong hormone factors in hypertension and several other chronic disorders for which no cause yet had been found.

As the ability to "break down" body secretions into hormone components became more refined, Dr Rhoads said, it was further expected that the study would develop a method of "screening" that would throw new light on mental deficiencies, criminal tendencies, and personality defects

Dr Rhoads said the prospect was the first major coordinated effort, except those during the war, to attack an important medical problem

EXTREME HYPERTHERMIA

MARTIN J LOEB M D , New York City
(From the Bronx Hospital)

CASES of extreme hyperthermia have been reported in medical publications from time to time. Galbraith in the *Journal of the American Medical Association*, March 31 1891, reported a temperature rise to 171 F This case was later found to be fraudulent.

A. Jacobi reported a temperature up to 148 F in a patient suffering from hysteria, and in his paper he referred to numerous instances of extreme hyperthermia.[1] Hombourger in a thesis on hyperthermic fevers collected many such reports, including the report of a case by Bryant in which the temperature reached 170 F.[2] Murdoch reported a fever in a hysterical patient which reached 120 F.[3] Some of these cases of high temperatures were later discredited.

It is noteworthy that cases of extreme hyperthermia, such as temperatures ranging from 120 to 170 F , were all reported in the literature in the latter part of the last century and the early part of this century.[1-3] There have been no reports of such extreme temperatures in recent literature. There is no question that all of these extreme cases were fraudulent, produced by some trick of the patient. The survival of patients with temperatures far above the heat rigor of mammalian muscle is obviously impossible. It is remarkable how many astute clinical observers of a previous generation were fooled by these tricks It seems that at the present time the patients are more honest, or the doctors are not so easily duped

Ward J McNeil states that temperatures above 114.8 F in man should be considered the result of fraud or trickery and are not to be accepted without more convincing proof than has so far been presented in any instance. Temperature readings between 41 (105.8 F) and 46 C (114.8 F) properly designated as hyperthermia, should be accepted as valid only after the most careful scrutiny of the evidence in each case."[4]

The temperature of the patient whose case is reported here reached at least 110 F since the thermometer was graded to 108 F and the space above 108 F to the top of the thermometer was equal to 2 degrees. It is my belief that the patient s temperature rose much higher It certainly reached 110 F on direct thermometer evidence

Case Report

L. F a well-developed 50-year-old man was admitted to the hospital June 2, 1944, in acute distress suffering from severe colicky pain of five days' duration in the left lumbar region radiating to the groin. His previous medical history was noncontributory

A flat plate revealed two stones in the left ureter above the bladder The patient was cystoscoped on the day following admission Two catheters were inserted to the left kidney around the stones in the ureter An attempt was made to remove the stones by manipulation which was not successful. For the next few days the patient was treated with antispasmodics and sedatives. The stones were small and superimposed on each other and it was thought that they would be expelled by conservative treatment. His temperature was moderate, around 100 F , and his symptoms were relieved. On June 7, 1944 the patient developed a severe chill, followed by a temperature of 104 F Two catheters were inserted around the stones to the pelvis. The temperature dropped to the previous level as soon as drainage was established The culture of the urine from the left kidney showed Bacterium coli and gram-positive cocci.

On June 10 the highest temperature was 99 F and we were encouraged to treat the patient conservatively The catheters were removed. The following day, the temperature rose to 101 F , and the patient had a chill. Later in the evening the temperature rose to 102 F On the morning of June 12 the patient was cystoscoped again An attempt was made to insert the catheters above the stones for the purpose of drainage. This was unsuccessful, because in the meantime the stones had become impacted For this reason it was decided to operate on the patient the same day The operation was scheduled for late in the afternoon. Before the hour of operation, however the patient developed a high temperature rising to at least 110 F This is the nurse s note of June 12, 1944 The patient developed a chill at 3·00 P.M. Immediately after the patient became very violent and maniacal. He was frothing at the mouth. He had convulsive-like twitching. He was given 1/4 grain morphine and 5 grains of sodium luminal intravenously to control him. It required several people to keep him in bed. He was placed in an oxygen tent and in an ice pack.

This is the report of the resident Dr Damask. At 3.30 P M June 12 1944 the patient suddenly became acutely ill. He had several chills and the temperature rose to 109 F , later to 110 F He became delirious and maniacal. The patient was placed in an ice sheet, and alcohol was placed over him. The respirations were labored the pulse rapid Stimulants and narcotics were administered also Ringer's and glucose solution were given intravenously

I saw this patient immediately after he became ill. It required the strength of several people to hold him down in bed. He was cyanotic and dyspneic. The dyspnea, however was undoubtedly caused by his struggling with several people to get out of bed. Because of the condition of the patient, no blood culture was taken at the time. The temperature dropped at midnight of the same day to 98 6 F but rose immediately to 105 F The following morning June 13, 1944 his temperature was 104 F., at which time it was decided to operate. A left nephrectomy was performed, since the patient had a marked pyelonephritis as well as stones in the ureter Following the operation the temperature gradually subsided On the first postoperative day the temperature was 103.4 F and on the fourth day the temperature came down to 100 F and fluctuated thereafter for the next week between 99 2 and 100.8 F after which it came down to normal. The patient was discharged on July 3 1944 about one month after admission. He was in excellent condition.

Summary

A case of hyperthermia caused by a pyelonephritis of the left kidney is hereby reported The patient recovered The temperature in this case rose to at least 110 F , since 110 F is the limit of the thermometer scale It is possible that the temperature was much higher

1882 Grand Concourse

References

1 Jacobi A. Tr A. Am Physicians 10 59 (1895)
2 Hombourger P The Hyperthermic Fevers Thesis University of Paris 1919
3 Murdoch, James H. Pittsburgh M Rev 8 297 (1894)
4 McNeil, Ward J Arch Int. Med 64 800 (Oct.) 1939

I am indebted to Dr Charles Klein for valuable suggestions in the preparation of this paper

NATION'S POPULATION DENSITY INCREASING

The density of population in the United States has increased approximately 90 per cent since the beginning of the century, according to the current Statistical Bulletin of the Metropolitan Life Insurance Company

In 1900, there were 25 6 persons per square mile of land area in our country, the Bulletin said This increased to 44 2 persons per square mile by the time of the 1940 census and reached 48 2 persons per square mile by the middle of 1947 Every state in the union showed an increasing density of population in the period 1900–1947, although the relative rise varied markedly from one state to another

Further statistics revealed that the most densely populated area of the country lies along the Atlantic Coast, from the Southern border of Maine to the Northern border of Virginia A second area of population concentration, of lesser density than the Eastern Seaboard, lies around the Great Lakes

Rhode Island was shown to be the most densely populated state in the union with approximately 720 persons per square mile Following in order were Massachusetts, New Jersey, and Connecticut The United States, as a whole, was shown to be one of the less densely settled countries in the world, and the Bulletin forecast that it would continue to be so for many years

As for "wide open spaces," Montana was shown to have only 3 4 persons per square mile, Wyoming, 2 8, and Nevada only 1 3

VITAMIN B-12 SEEN AS EFFECTIVE REMEDY FOR ANEMIA

Dr Tom Spies, professor of nutrition and metabolism in the Northwestern University Medical School, reported in a recent issue of the *Southern Medical Journal* that vitamin B-12, recently isolated, seems to be an effective remedy in treating anemia

Two persons with tropical sprue were admitted to the Havana hospital, and their bone marrow, red and white blood cells, and other blood conditions were completely checked

One of these cases, a 67-year-old Cuban fruit vendor, had all the symptoms of sprue for twenty years Three days after receiving a single dose of eight micrograms of B-12 he felt stronger By the sixth day he ate double portions of all foods offered. The soreness of his tongue had completely disappeared, and his gastrointestinal condition had markedly improved

The second sprue case was that of a 62-year-old man, so weak that he could not work. In the two and a half years he had been ill he had lost 70 pounds Three days after receiving a single injection of eight micrograms of vitamin B-12 his appetite returned, and his tongue was so much better that he could eat without discomfort By the sixth day his tongue was normal, and he was eating large quantities of food

Five other cases made similar dramatic recoveries Nevertheless, the question of maintaining patients on this new compound is yet to be answered, Dr Spies points out No other therapeutic agent is so effective in anemia in such small amounts

DEPARTMENT OF MEDICAL CARE INSURANCE

CONDUCTED BY GEORGE P FARRELL *Director*

Northeastern New York Medical Service Inc., Albany, New York
Edward R Evans, Executive Director

THE Northeastern New York Medical Service Inc 112 State Street, Albany New York, is the latest voluntary nonprofit medical care plan to organize in New York State The Plan serves the counties of Albany Rensselaer Schoharie Schenectady Montgomery, Fulton, Saratoga Washington, Warren, Essex, and Clinton Each of the medical societies in these counties assisted in the organization of the Plan and has approved it The Plan is also approved by the Medical Society of the State of New York.

The funds to start the Plan were advanced by county medical societies in the operating area according to membership

Officers, Directors and Executive Committee

The Executive Committee is composed of the officers of the corporation and three members elected by the Board of Directors and transacts all business subject to the power and authority of the Board of Directors. Officers and members of the Executive Committee are Charles A Brind Jr president Albany, Dr John E Heslin vice-president Albany Dr Stephen Curtis, vice-president Troy, Dr Lyle A Sutton, secretary, Albany, Donald Slingerand treasurer, Albany, Dr Joseph L Raley Saratoga and Dr Joseph H Cornell Schenectady

In addition to the Executive Committee the Board of Directors is composed of Dr Alton J Spencer Amsterdam, Dr David W Beard Cobleskill, Dr Robert S Kunkel, Gloversville Dr W S Bennett Granville Dr James E. Glenn North Creek Dr Leo F Schiff, Plattsburg Dr James E. Glavin Port Henry, William N Bissell, Edward S Poole James E Glavin Lorne A Davidson, Albany Frank L. Tolman Slingerlands Alfred Renshaw, Loudonville Harold S Turner Troy and the Rev John G Hart Albany All officers and directors serve without pay in the interest of their communities

Edward R. Evans executive director of Associated Hospital Service of Capital District is executive director of the medical plan

Enrollment

Northeastern New York Medical Service is offered only to subscribers of Associated Hospital Service of Capital District. Monthly rates for payroll deduction groups in the medical plan are Individual $1 00 husband and wife (without maternity) $1 75, husband and wife (with maternity) $2.25 husband and wife (with maternity) and all unmarried children under age 18 $2 25

Enrollment is also available to members on a direct payment basis. Quarterly rates are as follows Individual $3.25, husband and wife (without maternity) $5 60 husband and wife (with maternity) $7.35 husband and wife (with maternity) and all unmarried children under age 18 $7 35

Groups of five or more eligible employes of a single corporation may apply In groups from five to twenty 50 per cent participation is required and in groups over twenty 40 per cent is required

Applicants are eligible to enroll who have not attained age 65, however an applicant over 64 who is a Blue Cross subscriber may enroll regardless of age A subscriber may continue his membership indefinitely If he leaves a group he may continue his contract on a direct pay ment basis at direct pay ment rates

At the end of the first year of operation (December 31 1947) membership reached 22 778 and at the present time is in excess of 40 000

Benefits

The Plan provides service benefits to subscribers whose yearly incomes are not in excess of $2 000 for an individual $2 500 for applicant and spouse, $3 500 for applicant and members of family group The total indemnity for surgical care payable in any contract year shall not exceed $250 for applicant, $150 for any subscriber other than applicant and $450 total for family group

Medical service for hospitalized cases is limited to three weeks with a maximum allowance of $150 Initial hospital visit is $5 subsequent daily visits (limited to one a day) $3 additional visit on the same day $1 50 An extra allowance for long orthopedic cases extending to six weeks with $1 75 per day fourth week, $1.50 per day fifth week and $1.25 per day sixth week for such days as medical care is rendered.

A ten month waiting period is required for maternity care in the home or hospital for which an indemnity of $50 is allowed regardless of subscriber s income A limit of $25 is allowed for emergency first aid in communities where immediate hospitalization is not available

Anesthesia when administered by a physician is limited to $15 when not covered by a Blue Cross contract.

Exclusions

The Plan does not provide coverage for acute alcoholism drug addiction dentistry venereal diseases cosmetic other than restorative surgery mental or nervous disorders after diagnosis for which care by a psychiatrist is required tuberculosis, after diagnosis, as such cases covered by Workmen s Compensation and other laws, and any condition disease or ailment known to exist on the effective date of the contract

Participating Physicians

At the present time 800 doctors are participating in the Plan which represents approximately 100 per cent of all practicing doctors in the operating area.

Upon completion of medical service for a member the doctor submits a claim on forms provided by NEMS The Plan pays the doctor according to the specified benefits listed in the schedule of medical and surgical expense indemnities in the fee schedule

These amounts are in full payment for services rendered to subscribers whose incomes are not in excess of $2,000 for an individual, $2,500 for applicant and spouse, and $3,500 for applicant and members of the family group

For subscribers whose incomes are in excess of the above amounts, the doctor may charge a fee greater than the specified benefits listed in the schedule of fees in the fee schedule The Plan then indemnifies the doctor according to the schedule, credits the subscriber with that amount toward his total bill, and the difference, if any, is payable directly to the doctor by his patient

Northeastern New York Medical Service is the doctor's plan administered by the Associated Hospital Service of Capital District in the interest of economy However, in matters dealing with claims that require special consideration, a Medical Advisory Committee, composed of members of the medical profession, decides on the disposition of these claims in the interest of the doctor and subscriber

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ANNOUNCEMENT

The Board of Medical Examiners of the State Education Department has notified the State Department of Health of action taken recently by the Board of Regents with respect to the medical licenses of the following persons

Irving Epstein, 59 East 54th Street, New York City License revoked, effective March 1, 1948

Roy Terry Haskell, Akron, Ohio License permitting him to practice medicine in the State of New York revoked, effective June 4, 1948

George Francis Herrity, 455 East 83rd Street, New York City License revoked, effective March 12, 1948

Dwight S Hinsdale, Delanson License revoked, effective January 8, 1948

William M Lindenfeld, 190 Claremont Avenue, New York City License revoked, effective December 9, 1947

Frank E Fink, 161 West 75th Street, New York City License suspended for a period of two years from April 30, 1948, to April 30, 1950

Morris S Marks, 68 East 86th Street and 875 Park Avenue, New York City License suspended for a period of one year, from March 3, 1948, to March 3, 1949

John Hilbert Oberle, 1786 Bathgate Avenue, Bronx. License suspended for a period of one year, from January 9, 1948, to January 9, 1949

Leo J Palmer, Watertown, and 612 Hoffman Street, Elmira License suspended for a period of two years, from February 3, 1948, to February 3, 1950

Leonard R Smith, 157-11 Sanford Avenue, Flushing License suspended for a period of six months from March 2, 1948

Henry Blum, 66 Park Avenue, New York City License revoked, effective March 2, 1948 License restored, effective April 22, 1948

William Q C Bole, 137 Cortland Street, Groton To be censured and reprimanded, effective January 11, 1948

Ladislav Merei, 51-04 Skillman Avenue, Woodside To be censured and reprimanded, effective April 1, 1948

Irving Pinsley, 53 West Merrick Road, Freeport To be censured and reprimanded.

Frank P Redmond, 24 Clove Avenue, Haverstraw To be censured and reprimanded, effective June 4, 1948

George Clifford Rosenberg, 61 Plymouth Road, Rockville Center To be censured and reprimanded, effective March 3, 1948

Joseph Schwartz, 1336 Washington Avenue, Bronx To be censured and reprimanded, effective January 6, 1948

DEPARTMENT OF WORKMEN'S COMPENSATION

CONDUCTED BY DAVID J KALISKI M D , *Director*

THE Medical Appeals Unit of the Industrial Council of the State Labor Department, in a decision affirming the action of the Medical Society of the County of Erie recommended to the Chairman of the Workmen s Compensation Board of the State Labor Department that the application of the American Magnesium Company for an employer's medical license be denied [1]

The appeal to the Medical Appeals Unit was taken by the American Magnesium Company following refusal of the Medical Society of the County of Erie to approve its application for a license. The point at issue was whether a person *other than a duly registered nurse* is qualified in law to be in attendance in the medical bureau and to assist the bureau physician.

The Medical Appeals Unit in a written decision said We have reviewed the record and after due deliberation affirm the Erie County Medical Society on the ground that in a medical bureau of this kind it is important that a *registered nurse* be in attendance at all times if a physician is not in attendance at all hours We recommend to the Chairman of the Workmen s Compensation Board that the application of the American Magnesium Corporation for an employer's medical bureau be denied until such time as this requirement is met.

[1] Erie County Medical Bulletin January 1948 p 16.

WORKMEN'S COMPENSATION BOARD FEE SCHEDULE

The Advisory Committee on Revision of the Fee Schedule, which included in its membership Dr Nathan B Van Etten chairman, as well as Dr Walter P Anderton, has recommended the adoption of a new schedule which has been accepted by Miss Mary Donlon, the chairman of the Workmen s Compensation Board This is a comprehensive document which will be available for distribution shortly after August 1 at 25 cents per copy Orders may be sent to the office of the Board 80 Center Street, New York City 13

EXAMINATION FOR REGULAR CORPS

A competitive examination for appointment in the Regular Corps of the United States Public Health Service in the grade of assistant surgeon (first lieutenant) and senior assistant surgeon (captain) will be held in October The written examination will be conducted October 4 5 and 6 at places convenient to the candidates. The oral examination will be held at various points throughout the country

All applicants must be at least 21 years of age and citizens of the United States, must present a diploma of graduation from a recognized medical school and satisfactorily pass a physical examination performed by Public Health Service officers.

Physicians beginning internship on July 1 1948, will be admitted to the examination Successful candidates will be placed on active duty in the Regular Corps upon completion of internship on July 1, 1949

Applicants for the grade of assistant surgeon must have had at least seven years of educational and professional training or experience exclusive of high school. Applicants for the grade of senior assistant surgeon must have had at least 10 years of educational and professional training or experience, exclusive of high school

Entrance pay for an assistant surgeon with dependents is $5 011 a year and for senior assistant surgeon with dependents $5 551 a year This includes the additional pay of $1 200 for medical officers as well as subsistence and rental allowance. Provisions are made for promotions at regular intervals up to and including the grade of senior surgeon (lieutenant colonel) and for selection for promotion to grade of medical director (colonel) at $9 751 a year Retirement is authorized at either completion of 30 years service or at the age of 64 Full medical care, including disability retirement at three-fourths pay is provided

Application forms may be obtained from Public Health Service Hospitals, District Offices, or by writing to the Surgeon General United States Public Health Service Washington 25 D C

NECROLOGY

Sarkis H Abkarian, M D, eighty-five, of Pelham, died on June 24 He received his medical degree from New York University Medical School in 1889 and practiced in New York City and Pelham until his retirement about ten years ago For many years Dr Abkarian was with the New York City Board of Health He was a former president of the Armenian Medical Society

John Aikman, M D, sixty-three, died at his home in Rochester on July 13 He had charge of the pediatric section at Genesee Hospital and was assistant professor of pediatrics at the University of Rochester School of Medicine Dr Aikman was president of the Rochester Academy of Medicine in 1942 and had been chairman of the pediatrics section of the American Medical Association and the New York State Medical Society Dr Aikman was graduated from New York University College of Medicine in 1908, studied at Harvard University, and served as an intern at Bellevue Hospital, New York City

He also served in the Medical Corps during the first World War Recently, the Rochester Academy of Medicine conferred on him the Albert David Kaiser Medal for long and distinguished service in the field of pediatrics Dr Aikman was known as a world authority on the subject of accidental poisoning of children

J Wilford Allen, M D, eighty-four, of Orchard Hill, White Plains, died on July 17 A graduate of the New York State Homeopathic Medical College and Flower Hospital in 1905, Dr Allen was a former professor of materia medica at the Homeopathic Medical College He was formerly on the staffs of the Broad Street and Hahnemann Hospitals in Philadelphia He was a member of the American Institute of Homeopathy

William Cornelius Couch, M D, seventy-nine, died on July 5 At the time of his retirement in 1937, he had practiced medicine in Watertown for more than thirty years He attended the University of Buffalo Medical School and was graduated from Gross Medical College, University of Colorado, in 1895 Dr Couch was a member of the Jefferson County and New York State Medical Societies, and the American Medical Association

Clifford Ferrins Dowkontt, M D, fifty-four, died on July 15 at his home in New York City A plastic surgeon for thirty years, Dr Dowkontt was a member of the staff of the Plastic Surgery Institute He was graduated from Yale Medical School, *cum laude*, in 1919 He interned at St Luke's Hospital, New York City Dr Dowkontt was interested in plastic surgery, specializing in breast surgery He recently completed a book on the subject which will be published in September

Oswald D Glasberg, M D, forty-nine, New York City, died on July 15 He was graduated from the University of Vienna in 1926 and came to America in 1942 He was a member of the New York County and State Medical Societies and the Medical Circle He was associate dermatologist at City Hospital

Aquin S Kelly, M D, of New York City and Lawrence, Long Island, died on July 20 at the age of seventy He was graduated from Columbia University, College of Physicians and Surgeons, in 1900 and later studied ophthalmology in Vienna Dr Kelly became adjunct visiting ophthalmologist at St Vincent's Hospital in 1906 and later chief of the ophthalmological service there He was an honorary assistant surgeon in ophthalmology at New York Eye and Ear Infirmary and a consulting ophthalmologist at St Joseph's Hospital, Far Rockaway, Queens, and Meadowbrook Hospital, Hempstead

A former president of the New York Ophthalmological Society, Dr Kelly was a fellow of the New York Academy of Medicine, a member of the American Medical Association, New York State and County Medical Societies, and the American Ophthalmological Society He was a diplomate of the American Board of Ophthalmology

Norman J Lebhar, M D, of New York City, died on July 25 He was seventy years of age After studying at the University of London, Dr Lebhar was graduated from Columbia University, College of Physicians and Surgeons, in 1900 He practiced general medicine in New York City for forty-eight years

George Bolling Lee, M D, seventy-five, of New York City, died July 13 Dr Lee practiced in New York City for forty-nine years, after graduating from Columbia University, College of Physicians and Surgeons, in 1896 In 1898 he served as captain and contract surgeon with the United States Volunteers

In the first World War he was a captain in the Army Medical Officers Reserve Corps Dr Lee was on the staffs of Woman's Hospital, the Hospital for Joint Diseases, Bellevue Hospital, and Polyclinic Medical School and Hospital, where he had been professor of gynecology and obstetrics A fellow of the American College of Surgeons, Dr Lee was a member of the American Medical Association, the Greater New York Medical Association, the Academy of Medicine, Bellevue Hospital Alumni Association, and the New York State and County Medical Societies

Samuel McCullagh, M D, seventy-two, died on July 21 at his home in New York City An ear, nose, and throat specialist in New York City since 1903, Dr McCullagh was graduated from the University of Pennsylvania Medical School in 1898 In 1916 he was a medical officer of Squadron A and served with it at the Mexican Border In World War I he served in France in the Army Medical Corps and received the Distinguished Service Medal for his work

For many years Dr McCullagh was associated with the Manhattan Eye, Ear, and Throat Hospital and was also professor of clinical otology at the New York Polyclinic Medical School and Hospital He was a former president of the New York Medico-Surgical Society and of the New York Laryngological Society

He was a member of the American Laryngological, Rhinological and Otological Society New York Otological Society New York Academy of Medicine American College of Surgeons American Medical Association New York County Medical Society, and New York State Medical Society

Arthur Chalmers Martin M D sixty-one of Hempstead died on July 28 President of the Nassau County Cancer Society Dr Martin was for many years head gynecologist at the Nassau County Hospital Mineola He was a founder of the cancer committee in 1928 and was credited with establishing its nursing service the first of its kind in the United States

He organized tumor clinics at Meadowbrook and in Farmingdale and was a director of the Mother s Health Clinic in Mineola Dr Martin was consultant on obstetrics and gynecology to the North Country Community Hospital Glen Cove the Meadowbrook Hospital Hempstead, and the Huntington Hospital A former president of the Medical Society of the County of Nassau the Nassau Obstetrical Society and the Nassau Surgical Society

He was a fellow of the American College of Surgeons and a member of the Brooklyn Gynecological Society, the American Medical Association the Medical Strollers and the New York State Medical Society

James Alexander Miller M.D , seventy-four, of New York City and East Lyme Connecticut died on July 20 A former president of the New York Academy of Medicine and the American College of Surgeons Dr Miller was graduated from Columbia University College of Physicians and Surgeons in 1899

In World War I he served in the American Red Cross in France and for two years as medical director of the Rockefeller Tuberculosis Commission in France. He was awarded the French Legion of Honor in 1919 From 1913 to 1945 Dr Miller was professor of clinical medicine at the College of Physicians and Surgeons He was also consulting physician in tuberculosis at Bellevue Hospital and Woman s Hospital and consulting physician and president of Sprain Ridge Hospital Yonkers Dr Miller was a member of the Association of American Physicians the American Association of Thoracic Surgery the American Clinical and Climatological Association the New York State and County Medical Societies and the American Medical Association

Irving I Shellin, M.D., New York City died on December 20 1917 He was graduated from the University of Moscow Medical School in 1914 and Long Island College Hospital in 1922 Dr Shellin was a member of the Bronx County and New York State Medical Societies and the American Medical Association. He was sixty years of age

William Carl Treder, M.D of Schenectady and Scotia died on July 20 at the age of sixty-eight He received his medical degree from Albany Medical College in 1907 and taught bacteriology and pathology at Syracuse University in 1908 Dr Treder was Glenville health officer from 1913 until 1937 when he became Schenectady health commissioner From 1921 to 1937 he was Schenectady County coroner

Dr Treder was formerly president of the Schenectady County Medical Society and chairman of the Venereal Control Board He was a member of the New York State Medical Society the American Medical Association the American School Physicians Association, and the American Public Health Association

Albert Leopold Wahl, M.D of Mount Vision and Oneonta died on July 1 He was forty-one years of age Dr Wahl received his medical degree from McGill University Montreal, in 1935 During World War II he served in the Medical Corps of the Army Air Corps Dr Wahl was on the staff of Fox Memorial Hospital, Oneonta He was a member of the Otsego County and New York State Medical Societies the Montreal Medico-Chirurgical Society the Pan-American Ophthalmological Association and the Association of Military Surgeons of the United States.

Alfred Wiener M D., died July 21 at his home in New York City He was eighty two years of age In 1889 Dr Wiener was graduated from Columbia University College of Physicians and Surgeons He was on the staffs of St Luke s and Montefiore Hospitals New York City Dr Wiener was a member of the Academy of Medicine the American Academy of Ophthalmology and Otolaryngology, and the New York State and County Medical Societies

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DOCTORS OUT MAKING CALLS ARE PAGED BY RADIO

Paging doctors away from their offices will be the job of a special radio station to be erected in New York. Telanserphone Inc., has now been granted a construction permit by the Federal Communications Commission to test the feasibility of the plan

The station will provide only one-way transmission. It will serve the Immediate New York area Each doctor enrolled for the service will carry a small portable receiver Each will be assigned an individual code number This will be repeated on the air at intervals until the doctor reports to the station by telephone

The theory behind the plan is that by it any individual doctor when out making calls may be located more easily than by the present procedure in which he is located by telephone where frequently many calls must be made —*Science News Letter July 10 1948*

HOSPITAL NEWS

Postgraduate Course in Orthopedic Surgery

A COURSE for physicians seeking postgraduate work in orthopedic surgery will be given in the fall at the Hospital for Joint Diseases, New York City, according to an announcement made by Frederick Brown, president of the board, and Dr J J Golub, executive director of that hospital

The course, being offered in affiliation with Columbia University, will consist of 11 morning and 11 afternoon sessions held on consecutive Thursdays beginning October 7, 1948, and ending December 25, 1948

The curricula will include a series of lectures, case demonstrations, and conferences on the clinical, diagnostic, therapeutic, pathologic, bacteriologic, chemical, and radiologic aspects of skeletal disease, so integrated as to present a general review of the modern concept of the more important orthopedic diseases

There also will be opportunity for clinical examination of patients

Applications for registration should be made to the office of the assistant dean, graduate medicine, Columbia University, College of Physicians and Surgeons

Roosevelt Hospital Shows Disaster Unit in Action

ROOSEVELT Hospital, New York City, poured its manpower and medical resources into the first portrayal of its newly-organized, peacetime disaster unit on July 27

Set up to cope with civilian catastrophes, the disaster section, said to be the only one existent in a non-city-operated hospital, put on a full-dress rehearsal.

Dr Condict W Cutler, head of the disaster unit and a surgeon, pointed out that the hospital's fifty residential doctors and 141 graduate and student nurses were now ready to join the pool of city-hospital disaster units

Dr Cutler observed that every agency of the hospital was mobilized A dozen nurses stood by in the receiving room Litter bearers, ordinarily orderlies, were ready for the trip from the accident ward

Dr Joe Clemmins, hospital director, remarked that the wartime disaster unit has been revived because the area is "a singularly vulnerable community" He cited the possibility of bus crashes, highway accidents, and building collapses All neighborhood four-alarm fires will find a Roosevelt Hospital disaster team at the scene The hospital is ready, he said, and to prove it 15-page printed instruction sheets, detailing every move of the unit and its personnel, were distributed

New Bread Formula Developed by Department of Mental Hygiene for Use in State Hospitals

A NEW bread formula, adding considerable nutritive value to the flavorful loaf now produced, has been developed by the New York State Department of Mental Hygiene for use in their institutions, Commissioner Frederick MacCurdy has announced The new formula, which includes 6 per cent full-fat soy flour and 8 per cent fat-free dry milk solids, in addition to standard enriched white flour is an outgrowth of the long-range program for improvement of food in State mental hospitals and schools Research studies were initiated by the department three years ago with the appointment of an expert in dietetics and institutional feeding as director of nutrition services for all of the mental institutions

With the cooperation of a leading flour milling company, Cornell University's department of nutrition, and the American Dry Milk Institute, experiments were conducted by the food service department to devise improved recipes for enriched white bread that would increase the protein, vitamin, and mineral content of the daily diet The State institutions, all of which bake their own bread, were instructed to use dry skim milk and soy flour in the bread formulas they were developing for their own use Varying amounts were used by the institution food managers, who reported to the central office on the degree of success they achieved The standard formula finally arrived at was tested in two selected institutions, one with rather old-fashioned bakery equipment and the other having a modern baking plant with new machinery Under both conditions the results were eminently satisfactory, Dr MacCurdy indicated

"The chief objective in introducing an improved bread in State hospitals and schools," the commissioner said, "is to provide in a simple, practical, inexpensive way additional amounts of certain food elements in which the ordinary diet is frequently deficient The elements involved, found in such expensive foods as meat, milk and butter, would have required a prohibitive increase in the cost of the dietary if added in any other way"

"New York State has taken the lead," Dr McCurdy declared, "in producing a bread that not only adds needed food elements to the daily diet, but is more palatable and has better keeping qualities than the average high-grade loaf This significant contribution to the general health and well-being of the patients in our mental hygiene institutions has been achieved at no increase in cost—in some instances at a slight saving The formula has been made available to the institutions of other State departments and to the baking industry It is hoped that its full benefits in dietary enrichment will eventually be passed on to the general public"

Queens Hospital Beds and Premature Baby Centers Considered Urgent Needs

THE Hospital Council of Greater New York, as the official agency for the State Hospital Plan for New York City, announced in its *Bulletin* that it considers general care hospital beds for the Borough of Queens and facilities for the care of premature infants in New York City as urgent needs.

It was pointed out that under the Federal Hospital Survey and Construction Act (Public Law 725) one third of the cost of construction and equipment of approved projects would be provided by Federal funds. Two thirds of the cost must be met by the sponsoring groups—either voluntary or municipal hospitals.

Stressing the need for general hospitals in Queens, the Hospital Council emphasized that the total number of additional beds required is the largest for any of the five boroughs. New York City when considered as one area, has 65 per cent of the estimated total number of beds needed. For that reason its rating in comparison to the upstate regions is 'D' in order of priority

"However, for practical purposes, the Council stated "New York City will not be considered as one entity The degree of need met varies among the different boroughs and for that reason consideration will be given to the borough in greatest need of hospital beds

The Council's Master Plan for Hospitals and Related Facilities recommended that 4,647 general care beds should be located in Queens. Although there are located at present 2,599 beds of that type in Queens, only 1,771 are considered suitable for long range planning

This indicates that the borough requires 2,876 additional general care beds (4 647 minus 1 771 existing suitable) 'On the basis of percentage of need met (basis used by the Commission) Queens has only 38 per cent of the general care beds needed. A special committee has been appointed by the Council to guide and assist potential sponsors in Queens.

Pointing out the lack of adequate facilities for the care of premature infants the Council stated that especially trained personnel is not available except in centers where the number of babies cared for is large enough to warrant the establishment of separate services.

'The number of premature births in New York City, the *Bulletin* said, totalled 10,244 in 1945 and 12,644 in 1946 In 1947 it teached a total of 13 782' The Council emphasized that 'this increase has not been due to a rise in the incidence of prematurity, but is the result of the increase in the total number of live births during the past two years.

'The mortality among these infants is naturally proportional to the weight at birth' the *Bulletin* said. 'The greatest results may be expected in the care of infants weighing between 1,500 and 2 000 Gm., a group in which the mortality is still 18 per cent, although it has been greatly reduced in the past few years' It was pointed out that "infants weighing 1 500 Gm. and more constitute almost 90 per cent of the total number of prematures.'

The Council said that, 'it cannot be expected that all hospitals will be able to care adequately for them. The Department of Health in New York City has developed a program which would provide for the care of premature infants weighing less than 2 000 Gm. in approximately sixteen centers throughout the city It was brought out that 'under this program these infants would be transferred to the centers.

The Hospital Council explained that this program conforms to the general principles of the Master Plan for Hospitals and Related Facilities, which recommends that services which are required in a lesser degree should not be provided in all hospitals.

3,035 Army Hospital Beds Set Aside for Veterans

A TOTAL of 3 035 beds in Army hospitals throughout the United States have been allocated for treatment of veterans, Major General Raymond W Bliss, Surgeon General of the Army has announced. The allocations were made at the request of the Veterans Administration.

Beds allotted for veterans may be used partly for treatment of chronic disabilities with 325 set aside specifically for tuberculosis cases at Fitzsimons General Hospital in Denver

None of the hospital beds allocated will be used for patients who could be treated in domiciles

The list of hospitals where veterans will be assigned beds Army and Navy General Hot Springs Arkansas 175 beds allocated, Brooke General, San Antonio 400 Fitzsimons General Denver, 700 Letterman General San Francisco 175 Madigan General Tacoma, Washington, 350 McCormack General Pasadena, 100 Oliver General, Augusta, Georgia, 125 Percy Jones General Battle Creek, Michigan, 200, Tilton General Wrightstown New Jersey 275 Valley Forge General, Phoenixville, Pennsylvania, 175 Walter Reed General, Washington, D C 50 William Beaumont General, El Paso Texas, 150 Fort Benning Station Columbus Georgia, 50, Fort Belvoir Station Accotink, Virginia, 35 Fort Bragg Station, Fayetteville, North Carolina, 50 and Spokane Air Force Base Station Spokane, Washington 25

Greater New York Nursing Schools Report Increased Enrollments

A SURVEY by the Greater New York Hospital Association has revealed that the recruitment campaign of the Citizens Committee on Hospital Careers has stimulated student enrollment in the city's nursing schools.

Prospects for September 1948 classes surpass those of 1947 in 32 of the 37 registered and five of the nine practical nursing schools in the city Five registered and four practical nursing schools report that prospects for September classes are the same as last year.

Miss Helen Hayes, chairman and Anson C Lowitz, vice-chairman have headed the local drive in collaboration with the national campaign of the American Hospital Association and the Advertising Council to recruit 50 000 nurses.

A complete list of the registered and practical nursing schools in New York can be obtained from the Greater New York Hospital Association 72 Wall Street, New York City 5

High school education is not required for the one-year practical nurse courses.

NEWS NOTES

Formal opening of the new $1,500,000 wing of St Peter's Hospital, Albany, will take place sometime after Labor Day, Sister Mary Esther, hospital administrator, has announced The ten-story addition is to be well equipped with stainless steel equipment

Madison County is to have a laboratory, installed and maintained by the county, at Lenox Memorial Hospital, Canastota, according to a recent announcement

Plans are underway for the enlargement of the 28-year-old Dansville Hospital to 60 beds, with modern equipment which will make it a great medical asset to the Genessee Valley

Albany County has been asked by the County Tuberculosis Association to establish a county health department and a 250-bed tuberculosis hospital. The proposals are part of a report of a long-term planning committee of the association With eradication of tuberculosis and general improvement of health as the objectives, the committee suggests that the proposed health department setup include

Diagnostic chest and treatment clinics, continuance of free chest x-ray examinations on a more extensive scale than currently used, establishment and maintenance of a centralized tuberculosis case register, a county-wide public health nursing service with one nurse for each 5,000 population, and adequate laboratory facilities for public health requirements

With clinical and other services taken over by the Health Department, the tuberculosis association would expand its health education program as its major function in control of tuberculosis

Formal ground-breaking ceremonies were held in July for the new $400,000 service building at Mt St Mary's Hospital, Niagara Falls The building will house two new boilers, a refrigeration plant, laundry, and incinerator

More than 1,500 printed questionnaires, prepared by the community relations committee of the Placid Memorial Hospital fund, have been mailed to residents of Lake Placid, Keene, Keene Valley, Wilmington, Jay, Upper Jay, and the surrounding area

Mrs Raymond C Prime, chairman of the committee, in announcing the poll to seek popular opinion, said that response to the survey is expected to disclose not only what people know and think about the need for adequate, modern hospital facilities, "but will also be of great value in determining what steps to take to supply our area with the type of hospital service our people expect"

Plans for the construction of a 40 by 106 foot Quonset building to relieve present overcrowded conditions at the Potsdam Hospital have been approved by the State Board of Social Welfare in Albany, it has been announced by the hospital's board of trustees The State board is not setting up a rule of permitting Quonset buildings for hospital use in general but authorized the local structure due to the emergency which now exists at Potsdam Hospital

The present hospital building has a capacity of 69 beds, 26 bassinetts, and seven children's cribs At a peak time last year the hospital population reached 108 patients and required utilization of hallways A total of 3,069 patients was treated last year with an average of 88 8 per day

A cancer detection clinic has been organized by the medical staff of Geneva General Hospital It is held at the hospital each Tuesday morning at 10 00 A M

The clinic is staffed by four surgeons Drs Martin Coyne, Robert E Doran, Joseph A Gindling, and Philip W Skinner These surgeons have the aid of consultants Drs Kenneth Fairfax, Henry B Abbott, Bernard Putney, Albert M Crance, William E Achilles, and Gustav Selbach The clinic has the approval of the Ontario County Medical Society, the American Cancer Society, and the New York State Department of Health

The clinic is operating on an appointment and referral basis only to the end that only those patients referred by a physician are taken All reports and recommendations are sent to the patient's physician and are not sent to the patient No treatment is given at the clinic

The Franklin Delano Roosevelt Veterans Hospital, now being built in Crugers Park, south of Peekskill, is now 35 per cent complete, according to a recent announcement from the Corps of Engineers, New York District The project consists of 81 buildings ranging in height from one to four stories

Of the 13 hospital buildings, there will be five continued treatment buildings, a tuberculosis-neuropsychiatric building, two for the infirm, two buildings for acute cases and one for semiacute cases, a building for women patients, and the main clinical building The surgical suite, dental clinic, x-ray clinic, laboratories, pharmacy, and general administrative offices will be located in the main clinical building

All hospital buildings, including the kitchen and mess building, will be connected by closed corridors so that the patient, should he so choose, need never go out of doors The kitchen and mess building will having a seating capacity for 1,200 people, of which 1,008 seats will be for patients, 144 seats for attendants, and 48 seats for staff

Special attention will be given to recreation, entertainment, and occupational therapy work There will be a large gymnasium building which will include a swimming pool The recreation building will feature bowling alleys, canteen, library, billiard room, and music studios

Wyoming County Community Hospital is the first Western New York hospital to enter a comprehensive regional hospital plan, designed to improve the general level of medical care throughout Western New York which has been developed through the postgraduate department of the University of Buffalo Medical School

The plan extends the facilities of the Medical School to practicing physicians and allied medical personnel through the area and brings teaching programs—and in some instances, interns—to qualifying hospitals in the smaller communities.

Each hospital which becomes a part of the plan will enter into affiliation with the Medical School and with one or more of the teaching hospitals now associated with the Medical School—The Buffalo General Meyer Memorial, Millard Fillmore and Children s Hospitals

A symposium on obstetrics was held at the May meeting of the medical staff of Ossining Hospital Speakers were Drs. Spencer Myers, A. S D Eloia Aurelius C Somisa, Harold W Kipp, Joseph J Arminio George Vogel, and Alfred Blazer Discussors of the symposium were Drs. Robert W Helm, J F Schafmeister John W Reilly Edwin H Huntington Charles L. Briant Charles C Sweet R. J Wren M S Rednick B I Kaplan Leon Kienholz, and Bernard Glueck.

From July 1 1947 to June 30, 1948 940 patients were admitted to Mercy General Hospital Tupper Lake for treatment In addition 133 ambulatory patients received treatment in the emergency operating room, laboratory and x ray department, making a grand total of 1 073 patients cared for at the hospital during the year

PERSONALITIES

Honored

To Dr James A. Brussel assistant director of Willard State Hospital first and second prizes in the 1948 national contest of the American Physician s Literary Guild, for a satirical opera, Dr Faust of Flatbush and a short story Cafe au Lait Dr Brussel has captured first and second prizes every year since the contest started three years ago

Appointed

Dr Ralph Horton superintendent of Homer Folks District State Tuberculosis Hospital Oneonta, since 1934, as general director of Tuberculosis Hospitals in the State Health Department s Division of Tuberculosis Albany To the New York State Board of Nurse Examiners for a five-year term, Mrs. Cecelia T Abrahamer principal of the Willard State Hospital School of Nursing

Dr Joseph Earl Snyder, former assistant director of Graduate Hospital of the University of Pennsylvania, as director of Vanderbilt Clinic and administrative assistant in charge of professional services to patients, Columbia Presbyterian Medical Center, New York City

As assistant resident physicians St Joseph s Hospital Yonkers, Dr Basil Harris, Jr , New York City and Rye Dr Frank H Healy, San Bernardino California Dr William S. Hannan Andover Massachusetts and Dr Warren H. Knauer Elizabeth New Jersey All four doctors were formerly at St. Vincent s Hospital, New York City

Elected

Dr Earl C Wagner Tupper Lake, as president of the medical staff of Mercy General Hospital, Tupper Lake, succeeding Dr Morrison J Hosley, Long Lake. As vice-president of the Mercy General Hospital staff, Dr Roy W Bury Faust, and as secretary treasurer Dr Arthur Hershman Brooklyn Dr Emanuel Freund for 12 years a practicing physician in Haverstraw, as president of the medical staff of the Good Samaritan Hospital Suffern.

HORMONE, VITAMIN USEFUL IN COMBATING LIVER ILLS

Use of synthetic male sex hormone for treatment of chronic liver disease was announced by an eight man research team of the University of California Medical School and the U.S Naval Hospital Oakland, California, at the meeting in Chicago of the American Medical Association

The treatment is aimed at helping patients with damaged livers build up body proteins from the meat and other protein foods they eat. In cirrhosis and other forms of liver damage the body may fail to build protein Giving one of the protein building blocks, an amino acid called methionine helps some patients

But others are not helped even by this In such cases the Navy-California scientists advise trying doses of male hormone

Scientists reporting this research are Drs J. W Kinsell G D Michaels, H A. Harper Sheldon Margen W E Larsen A V Holmes D B McCallie, and E. F Evans.

A vitamin test for early detection of liver disease was reported by Drs Shepard Shapiro and Murray Weiner of New York and Dr Paul Unger of Miami

Liver disease is definitely increasing in this country, Dr Shapiro said. Many contracted jaundice while in military service and a notable increase in alcoholism has also played an important part in the rising rate of cirrhosis of the liver

In their test for liver disease, they inject vitamin K, sometimes called the anti-bleeding vitamin through the veins to the liver If the liver is healthy it uses the vitamin normally and completely as shown by its production of the blood-clotting substance prothrombin The diseased liver however utilizes the vitamin only partially and with considerable delay —*Science News Letter July 3 1948*

MEDICAL NEWS

Baruch Fund Sees Gains for Disabled

THE Baruch Committee on Physical Medicine, in its annual report announced that it had achieved three major objectives—increased the number of physicians trained to teach and use physical medicine, provided for more extensive research in physical medicine, and helped insure the proper use of physical medicine in rehabilitation and preparedness programs

The committee was formed in 1944 by Bernard M Baruch in memory of his father, Dr Simon Baruch, a pioneer in physical medicine and a leading American exponent of hydrotherapy

The report was issued by Dr Frank H Krusen, director of physical medicine at the Mayo Foundation, Rochester, Minnesota.

"Although the full effect of the research and training of physicians will not be felt for some time," Dr Krusen said, "there have been immediate effects in the rehabilitation and medical care of thousands of disabled veterans and even more disabled civilians

"Many disabled veterans are today living self-sufficient, independent lives in their own communities because of the increased emphasis given physical medicine and rehabilitation by the military services and the Veterans Administration, an emphasis which would not have been possible without the research and training of physicians provided for by the Baruch Committee

"Through the committee such opportunities are gradually being brought also to the far greater number of civilian casualties of peace"

The report said that of an original allocation of $1,250,000, sums totaling $900,000 were given to Columbia University, New York University, and the Medical College of Virginia to establish three centers for physical medicine and rehabilitation These centers, it was predicted, would serve as models for medical schools and hospitals here and abroad

In addition, research and training projects are being conducted under committee grants at the Massachusetts Institute of Technology, Harvard, Marquette, Washington, and George Washington Universities and the Universities of Minnesota, Illinois, Southern California, and Iowa

Fall Postgraduate Courses by American College of Chest Physicians

THE Council on Postgraduate Medical Education of the American College of Chest Physicians is sponsoring three postgraduate courses in the latest developments in the specialty of diseases of the chest Each of the courses will be of one week's duration and is open to all physicians Tuition fee is $50 for each course, and registration is limited to 50 physicians for the courses being presented in Chicago and New York City Reservations will be accepted in the order received

New York City, November 8 through 12, 1948 First annual postgraduate course presenting the newer aspects of diseases of the chest. Course to be held at the Hotel New Yorker, New York City

San Francisco, California, September 13 through 17, 1948 In cooperation with the University of California Medical School and Stanford University School of Medicine For information write to Stacy R Mettier, M D , head of postgraduate instruction, Medical Extension, University of California, San Francisco, California.

Chicago, Illinois, September 20 through 25, 1948 Third annual postgraduate course presenting the recent developments in all aspects of diagnosis and treatment of diseases of the chest Course to be held at the Hotel Stevens, Chicago

Applications for the course to be given in Chicago and New York City should be made through the Executive Offices, American College of Chest Physicians, 500 North Dearborn Street, Chicago 10

New York City Health Department Openings

THE New York City Department of Health has announced the availability of several positions open in the following categories

1 Pediatrician (two positions) In-service field orientation for nine months or for twelve months Probable stipend $350 per month These are full-time positions and designed to serve as an excellent preparation for physicians interested in exploring the public health field as related to children's services The period of training will be spent in observing and working in various public health activities in relation to children

The basic qualifications for these positions consists of eligibility for the examination by the American Board of Pediatrics These openings should be of particular interest to a physician who is just finishing a residency in pediatrics

2 Physician-in-Training (two positions) Formal academic training in a school of public health leading toward a degree Full tuition and a probable stipend of $350 per month for the eight-month school year will be paid

Applicants for these training positions are required to have an M.D degree from a school recognized by the American Medical Association, one year's internship in a general hospital approved by the American Medical Association, and eligibility to practice medicine in New York State

Applicants interested in these opportunities should communicate immediately with the Bureau of Personnel, Department of Health, 125 Worth Street, New York City 13

[Continued on page 1854]



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[Continued from page 1852]

Tuberculosis Association Report Made Public

THE popular fallacy that tuberculosis is primarily a disease of youth has been exploded when it is shown that 46 is the average age of death from this cause in New York City The information is included in the 1947–1948 annual report of the New York Tuberculosis and Health Association as made public by Dr Kendall Emerson, president

In 1900 the average age at death in New York was 33 years, rising to 34 by 1920 In 1940 the age at death from tuberculosis had jumped to 42, a gain of almost a decade In explaining this age gain, Dr Herbert R Edwards, executive director of the association and former chief of the Bureau of Tuberculosis of the New York City Department of Health, attributed it to advances in public health procedures

"Although it is impossible to lay the cause to any one thing," Dr Edwards said, "it seems that young people, formerly the chief victims of tuberculosis, are better protected against infection now than in past decades Tuberculosis may remain dormant in the body for many years without any clinical evidence of its existence Thus, we may assume that many people now dying of the disease in the older age groups actually became infected thirty or more years ago "

Describing the association's statistical service, headed by Godias J Drolet, as the "intelligence section" in the war against tuberculosis, the report recounted the results of a five-year study of data assembled from 40 tuberculosis clinics, 43 hospitals in the metropolitan area, the Public Health Nursing Service of the Department of Health, and 23 consultation services for private physicians The study showed that central Harlem led the city's 30 health districts with a tuberculosis death rate of 180 per 100,000 population The Gravesend district of Brooklyn had the lowest rate with 17 per 100,000

The average annual death rate from tuberculosis among the city's white population was stated to be 36 per 100,000 and 176 among Negroes The report added that in both racial groups more men than women died of this cause The first quarter of 1948 showed a gain in the total rate for the city of seven per cent, the first such increase since 1943 In 1947 there were 3,128 deaths from the disease in the city, or more than eight for each day of the year

The report cited statistics to show that, since the formation of the association in 1902, the tuberculosis death rate in New York City has dropped from 242 per 100,000 population to just below 40 per 100,000 Case-finding by means of chest x-rays, coupled with intensive educational work, both designed to bring about early care as well as prevention of the disease, were stated to be the most important tasks now before the association During the fiscal year ended on March 31, 1948, 25,824 x-rays were taken in the Bronx, Manhattan, and Richmond under association auspices In the same boroughs 229,774 persons attended showings of motion pictures on health subjects or attended lectures, meetings, and exhibits arranged by the association More than 10,000 families and individuals were assisted with health problems

The New York Tuberculosis and Health Association, which is largely financed through the sale of Christmas Seals, covers Manhattan, the Bronx, and Staten Island, operating in the latter areas through borough committees The association works in close cooperation with the Queens and Brooklyn associations and with the city Departments of Health and hospitals as well as with other official agencies

Medical Civil Service Positions Open

ON OCTOBER 2, 1948, the New York State Department of Civil Service is holding examinations for medical positions The positions available and the number of the examination are as follows associate cancer radiologist, 8,067, senior psychiatrist, 8,212, biochemist, 8,196, dentist, 8,200, junior pharmacist, 8,206, senior laboratory technician (TB), 8,211

The first three examinations are open to residents of any state, while the last three are limited to legal residents of New York State

Applications must be filed on or before August 23, 1948 Application forms and detailed announcements of each position, giving duties and minor qualifications, may be obtained at the following locations Examinations Division, State Department of Civil Service, State Office Building, Albany, New York, or State Department of Civil Service, Room 2301, 270 Broadway, New York City 7

When writing for application forms, specify number and title of the position, and enclose a large self-addressed return envelope bearing six cents postage

Siliform Ampuls Recalled by Manufacturer

DRUGGISTS and the medical profession were urged today by the Federal Security Agency's Food and Drug Administration to return all stocks of Siliform Ampuls to the manufacturer, the Heilkraft Medical Company, Boston, Massachusetts This injection drug, which should be sterile, is potentially dangerous, since samples collected on the market contain living organisms Siliform is injected by some physicians and osteopaths in the belief that it will relieve patients suffering with rheumatism as claimed by the manufacturer

The Food and Drug Administration found the contaminated samples after a routine inspection at the Heilkraft factory disclosed that the Siliform Ampuls had been manufactured without sterilization Intensive recall efforts by the manufacturer and the Food and Drug Administration for the past two weeks have not brought in all the contaminated stocks The article, which moves slowly, was shipped to 37 states from Maine to California and later was redistributed by wholesalers who cannot trace many of their sales Some going back as far as 1946 have been found on the market These ampuls may be in the hands of doctors, hospitals, clinics, and retail and wholesale druggists

[Continued on page 1856]



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[Continued from page 1854]

The Health of New York City

THERE were 61 cases of poliomyelitis and three polio deaths reported to the New York City Department of Health during July, the Department announced This compares with 103 cases and 11 deaths in July, 1944 (last bad polio year in New York City) and 55 cases and six deaths in 1946.

During the first seven months of this year there were 74 polio cases reported to the Department of Health as against 116 cases for the first seven months of 1944 and 76 cases for the similar period in 1946 There were 13 cases reported in July, 1947, and 22 cases in the first seven months last year

"While the number of cases reported this year is an increase over the number in 1947, which was a 'low polio year' here, it is not an alarming increase," Dr Samuel Frant, First Deputy Commissioner of Health, said

"Fortunately the cases in New York City this year are mild, as is proved by the small number of deaths and the fact that in paralyzed cases the paralysis is less than in previous years

"In July, 1944, and July, 1946, there was about one death for every ten cases This year there has been one death in 20 cases Not all cases of polio are accompanied by paralysis," Dr Frant pointed out "In some mild cases there is merely fever, stiffness of the neck and muscular pains which do not go on to paralysis In cases where paralysis does occur complete recovery is not unusual"

In previous years, Dr Frant said, paralytic cases have run from 66 to 75 per cent of all cases reported while this year paralytic cases have dropped to 57 per cent.

There are no vaccines or serums which will provide immunity to the disease, Dr Frant said General measures of hygiene and sanitation, including adequate rest, should be followed

"There is an apparent relation between fatigue and lack of resistance to polio," Dr Frant said "Therefore, it is wise to prevent children from becoming overtired at this season Parents should not, however, restrict their children's ordinary activities The crowding of children should be discouraged, whether it is in swimming pools, at parties, picnics, or elsewhere There is no good evidence that polio is spread by water, there is no objection to swimming"

The 61 cases of polio during July, as reported by boroughs, were Manhattan, 10, Bronx, 22, Brooklyn, 13, Queens, 16, and Richmond, 0

There were 13,715 births reported in July bringing total births for the first seven months of the year to 90,497 In July deaths totaled 6,433 Deaths in the first seven months totaled 49,479

Fellowship in Industrial Psychiatry Awarded at Cornell

DR GRAHAM TAYLOR of the Allan Memorial Institute of Psychiatry, Montreal, has been selected as the first industrial psychiatry fellow in the School of Industrial and Labor Relations at Cornell University, N P Catherwood, dean of the school, recently announced

Believed to be the first of its kind, the fellowship is part of the school's new program to train psychiatrists for the industrial and labor relations field The project, originated by Dr Alexander H Leighton, Cornell psychiatrist, is supported by a grant from the Carnegie Corporation Dr Taylor will begin a two-year program at the school in September He will divide his time during the fellowship between studies and research on the campus and first-hand investigations in industrial plants

Dr Taylor is studying at Allan Memorial Institute under Dr D Ewen Cameron He was graduated from McGill in 1939 and took his M D there in 1943 He later served a rotating internship in Montreal hospitals before joining the Royal Canadian Navy He has made studies of industrial problems as part of his work at the Allan Memorial Institute

Reorganization of City Health Department Announced

THE reorganization of the New York City Department of Health first proposed by Dr Harry S Mustard, Commissioner of Health, and approved by Mayor William O'Dwyer and the Board of Estimate became effective August 2 Under the reorganization 19 different units of the Department are placed in five major divisions, with two divisions headed by deputy commissioners and three divisions headed by assistant commissioners Four other units of the Department, the Bureau of Personnel, Legal Division, Public Information and Analysis units, will operate directly under the Commissioner

Dr Mustard also designated Harry Hollander, former deputy assistant Corporation Counsel, as counsel to the Health Department and chief of the Department's legal division Dr Mustard has designated the two deputy commissioners and three assistant commissioners The persons designated and the divisions they will direct are

Dr Samuel Frant, first deputy commissioner, will coordinate the activities of the other divisions, assign Department staff members, serve as commissioner during any absence of the commissioner, and head the Community Health Services division of the Department

Matthew A. Byrne, who has been deputy commissioner in charge of administrative services since 1946, will continue in that post He will serve as the Department's budget officer, assign nonprofessional personnel and represent the commissioner in dealing with groups of employes

Dr Ralph S Muckenfuss will serve as assistant commissioner in charge of the Preventable Disease and Adult Hygiene Services Division

Dr Leona Baumgartner will serve as assistant commissioner in charge of the Maternal and Child Health Services Division

Jerome Trichter has been named assistant commissioner in charge of the Environmental Sanitation Services Division

[Continued on page 1858]

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[Continued from page 1856]

Under the reorganization now in effect the Office of the Secretary of the Department, the bureaus of Maintenance, Audits and Accounts, and Records and Statistics will be under Deputy Commissioner Byrne

Under Community Health Services will come District Health Administration, the Nutrition Division, the Bureau of Nursing and the Bureau of Public Health Education Maternal and Child Health Services cover the bureaus of Mothers and Young Children, Physically Handicapped Children, Dentistry and School Health The Preventable Disease and Adult Hygiene Services will embrace the bureaus of Preventable Diseases, Tuberculosis, Social Hygiene, Laboratories and Adult Hygiene The bureaus of Food and Drugs and of Sanitary Engineering will come under Environmental Sanitation

To replace Dr Muckenfuss as director of the Bureau of Laboratories Gustav I Steffen, Ph D has been named The Bureau of School Health, newly created, is headed by Dr Robert W Culbert

MEETINGS

FUTURE

International Society of Hematology

The first convention of the International Society of Hematology, which was organized two years ago in Dallas, Texas, will be held from August 23 to 26, in Buffalo, with headquarters at the Hotel Statler

Delegates are expected from England, France, Poland, The Netherlands, Norway, Sweden, Argentina, Mexico, and Canada, as well as the United States The convention is being sponsored by the University of Buffalo

Dr Ernest Witebsky, head of the department of bacteriology and immunology of the University of Buffalo Medical School, is chairman of the program committee and of the arrangements committee

American Academy of General Practice

The first meeting of the general membership of the recently formed New York State Chapter of the American Academy of General Practice probably will be held some time in September at Syracuse, according to an announcement by Dr W Pierce Taylor of Buffalo, a member of the Board of Directors of the New York State Chapter

Fifth District Branch

The forty-second annual meeting of the Fifth District Branch of the Medical Society of the State of New York will be held on September 14 in Watertown

At the luncheon meeting of hospital representatives and physicians, which begins at 12 00 noon at the Black River Valley Club, a panel discussion on hospital problems will be held. Speakers are Dr Malcolm T MacEachern, Chicago, director of hospital activities, American College of Surgeons, Dr Finla G Crawford, vice-chancellor, Syracuse University, Edward J Noble, New York City, chairman, North Country Hospitals Corporation, Esther Thompson, director of nursing education, University of Rochester, and H S C Stephenson, Utica, managing director, Hospital Plan, Inc Moderator will be Dr John J Burke, Albany, executive director, Joint Hospital Survey and Planning Commission

The afternoon session for physicians will be held at 2 30 P M at the Y M C A Building Speakers will be Thomas Clearwater, attorney for the Medical Society of the State of New York, Dr William S Brady, Utica, Dr Dan Mellen, Rome, Dr Richard H Lyons, professor of medicine, Syracuse University, Dr George F Bock, Watertown, Dr Martin F Hilfinger, Syracuse, Dr Olin J Mowry, Oswego, and Dr Murray M Gardner, Watertown

The evening session will be for physicians and their wives, hospital representatives, and members of the Woman's Auxiliary, and will be held at the Black River Valley Club at 6 00 P M Speakers will be Dr Leo F Simpson, president of the Medical Society of the State of New York, Mrs Edgar M Neptune, president of the State Woman's Auxiliary, and Dr MacEachern

Eighth District Branch

The 1948 meeting of the Eighth District Branch of the Medical Society of the State of New York will be held on September 16 at the U S Veterans Administration Facility in Batavia

Speakers at the afternoon session, which begins at 2 30 P M , are Dr Hobart A Reiman, professor of medicine, the Jefferson Medical College of Philadelphia, and Dr Anthony F DePalma of Philadelphia Officers of the State Medical Society will be introduced at the dinner meeting at 6 30 P M , and Dr Leo F Simpson, of Rochester, president of the Society, will speak Mrs Edgar M Neptune, president of the State Woman's Auxiliary, and the Rev Dr Norman Vincent Peale, pastor of Marble Collegiate Church, New York City, will also speak

In charge of the meeting are Dr Robert G Peale, Olean, Eighth District Branch president, Dr Sydney L McLouth, Corfu, and Dr E Dean Babbage, Buffalo, president of the Erie County Medical Society

Mississippi Valley Medical Editors' Association

- The fifth annual meeting, Mississippi Valley Medical Editors' Association will be held at the Hotel Abraham Lincoln, Springfield, Illinois, September 29 This will probably be the last meeting under the above title as the Association's purpose will be enlarged and its constitution revised at Springfield

Dr Vincent T Williams, President, Kansas City, Missouri, editor of the *Jackson County Medical Society Weekly Bulletin*, will preside In the afternoon, Dr Morris Fishbein, editor of the *Journal of the American Medical Association*, will give a course in medical writing There will be a fellowship hour and dinner Speakers in the evening will include Dr Fishbein of Chicago and Dr Waltman Walters of Rochester, Minnesota, editor-in-chief of *Archives of Surgey* and the *Lewis-Walters' Practice of Surgey*

The meeting will be held during the 13th annual convention of the Mississippi Valley Medical Society All ethical physicians and those interested in medical writing are cordially invited Nonmembers will be charged a small fee for the afternoon course in medical writing, there is no registration fee for the evening session Write Harold Swanberg, M D , Secretary, W C U Building, Quincy, Illinois, for a complete program

[Continued on page 1860]

Findings from the Saratoga Spa records*



CORONARY DISEASE

One hundred seven coronary cases were recently studied Of this group 33 were females 74 males the latter being chiefly from executive and professional walks of life. Not a few were physicians The aver age age was 61, the range being 40 to 80 years. The average duration of symptoms was three years the limits being one month to 10 years. In 32 there was a def inite history of coronary occlusion Twenty seven had a history of pre-existing high blood pressure, eight of low pressure

Classified according to the American Heart Association 44 were in Class IIA (activity slightly limited) and 63 in Class IIB (activity greatly limited)

Before beginning a regime each patient was subjected to a thorough physical ex amination together with all indicated laboratory procedures The average of the initial blood pressure readings made at this time was 168-95 The final average figure arrived at was 140-81, a difference of 28 mm of mercury in the systolic and 14 in the diastolic reading These read ings were made after a rest period to obviate the influence of any recent activity

Symptomatic Change According to Age Groups

Age group	No Cases	Improvement		
		Moderate	Marked	None
40-50	11	10	0	1
50-60	41	32	5	4
60-70	34	22	8	4
70-80	18	16	0	2
80-	3	3	0	0
	107	83	13	11

A reprinted from the New York State Journal of Medicine, 35: 715, (July 15) 1935



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Listed by the Committee on American Health Resort of the American Medical Association

THE EMPIRE STATE'S CONTRIBUTION TO THE MEDICAL PROFESSION

[Continued from page 1858]

National Medical Public Relations Conference

A national medical public relations conference, first of its kind, will be held in St Louis on November 27, Dr George F Lull, secretary-manager of the American Medical Association, has announced

"Shooting at Common Targets in Medical Public Relations" is the theme of the conference, to which will be invited public relations directors, executive secretaries charged with public relations duties, and public relations committee chairmen from each of the 48 state medical societies

Featured for luncheon and dinner talks will be noted and qualified speakers on the following topics "The Public Speaks on Health," "What Public Relations Did for Us," and "Yes, the Profession Needs PR"

At the workshop session, which will be run in the afternoon from two to five o'clock, carefully selected discussion leaders from the state societies will grapple with these six major social issues facing the medical profession selling the need of public relations to state medical society members, encouraging wider use of medical prepayment plans, setting up workable systems for handling night calls, the rebate problem, developing good will with labor, farm, industrial, and co-op groups, and cooperating with health agencies

The conference will immediately precede the annual secretaries-editors meeting, which is being held in conjunction with the annual Interim Session of the American Medical Association, November 28 to December 3

Dr Lull declared that the planning and guiding of the conference would be handled by Lawrence W Rember, William Doscher, and John Bach of the Association's public relations staff

PERSONALITIES

Awarded

Dr George Gray Ward, New York City, the Alumni Medallion for "distinguished service to American medicine" at the ninetieth commencement exercises of the Long Island College of Medicine in June Dr S Edward King, New York City, the Bronze Star Medal by General Dennett, Surgeon, First Army, for services in 1944 in the European Theater of Operations Dr John Scudder, New York City, an honorary degree of Doctor of Science at the June commencement exercises at Rutgers University

Elected

As officers of the Women's Medical Association of New York City, for a period of two years president, Dr Elaine P Ralli, first vice-president, Dr Leoni N Claman, second vice-president, Dr Mary A. Jennings, treasurer, Dr Helen J Neave, and secretary, Dr Margaret S Tenbrinck Dr Samuel Sanes, chief pathologist at the Edward J Meyer Memorial Hospital, Buffalo, as president of the Erie County Chapter of the American Cancer Society

As officers of the Baccelli Medical Club of Buffalo for the year 1948–1949 Dr Samuel Varco, president, Dr Michael H Barone, vice-president, Dr Salvator V Cavaretta, secretary, and Dr Joseph A. Syracuse, treasurer

As president of the Allegany County Welfare Committee, Dr Roland L Warren, of Alfred

Appointed

Dr Hollis S Ingraham, Albany, director of the State Department of Health's bureau of communicable disease control, as deputy commissioner for the State Department of Health. To the faculty of medicine, College of Physicians and Surgeons, Columbia University, Dr Samuel L Peck as associate clinical professor of dermatology, Dr L E Siltzbach, assistant clinical professor of medicine, Dr Solomon Silver, assistant clinical professor of medicine, Dr Louis J Soffer, assistant clinical professor of medicine, and Dr Arthur S W Touroff, clinical professor of surgery

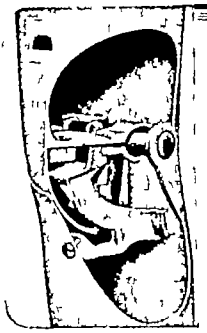
Dr William L Watson, chief surgeon of the Thoracic Surgical Service, Memorial Hospital Center for Cancer and Allied Diseases, New York City, as associate professor of surgery at the New York University College of Medicine and director of the Tumor Clinic at the New York University-Bellevue Medical Center Dr Frank C Sutton, acting director of Rochester General Hospital, as director of Miami Valley Hospital, Dayton, Ohio

As professor of physiology and pharmacology at the Long Island College of Medicine, Dr Chandler M Brooks, from the Johns Hopkins University School of Medicine As professor of bacteriology, Long Island College of Medicine, Dr Thomas P Magill, former associate professor of bacteriology and immunology at Cornell University Medical School. Dante A. Torres, Yonkers, as chief therapist of the Institute of Rehabilitation and Physical Medicine, New York University-Bellevue Medical Center

New Offices

Dr Harrison M Karp, who has recently completed postgraduate training in ear, nose, and throat medicine at Albany Medical School, to practice in Schenectady Dr Joseph H Melant, graduate of the University of Buffalo Medical School and veteran of two years' service with the Army Medical Corps in Germany, practice of otolaryngology in Lackawanna Dr Eleanor Kellogg Peck, the practice of general medicine and pediatrics in Poughkeepsie Dr Edward Siegel, formerly of Forest Hills, Long Island, in Plattsburg, for the treatment of diseases of the eye, ear, nose, and throat Dr M Scandiffio, formerly of Silver Springs, Maryland, practice of pediatrics in East Hampton Dr Charles Steenberg, of Vestal, to Binghamton for practice of general surgery

[Continued on page 1862]



PRECISION BUILT by Expert Craftsmen

The knee-joint cross-section shows that Hanger Artificial Limbs are not complicated mechanisms, not loosely fitted pieces, but a few expertly machined parts carefully assembled by experts. The simple construction making possible the efficient operation of Hanger Limbs is the result of long study and research. It is dependent on precision-made parts properly assembled. Hanger craftsmen are carefully selected and trained for this important work. Each Hanger Limb therefore conforms to specifications developed by years of experience.

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Liver Extract (10 USP Units—injectable)	100 mgm.
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[Continued from page 1860]

COUNTY NEWS

Cayuga County

Dr Herman O Mosenthal and Dr George Saypol, both on the staff of Post-Graduate Medical School and Hospital, New York City, spoke on the medical and surgical treatment of hypertension at the June meeting of the Cayuga County Medical Society A discussion followed the two addresses Dr C T Yarington, Moravia, president of the society, presided at the dinner meeting

•

On September 16 at 8 30 P M , Dr Richard H Lyons, professor of medicine, Syracuse University, will speak on "The Management of Peripheral Vascular Disease States" The meeting will be at the Osborne Hotel, Auburn, and is sponsored for the members of the Cayuga County Medical Society by the Council Committee on Public Health and Education of the State Medical Society with the cooperation of the New York State Department of Health

Chenango County

The Chenango County Medical Society has endorsed the establishment of a permanent Red Cross blood bank in Norwich. Dr John H Stewart reviewed the blood bank plan for members of the Chenango County Chapter of the American Red Cross at a meeting of the chapter on June 16

•

Dr J G Fred Hiss, of Syracuse University College of Medicine, spoke on the subject of rheumatic fever at the luncheon meeting of the Chenango County Medical Society in June

Cortland County

"Atomic Radiation and Its Effects" was discussed by Dr Joe W Howland, instructor in medicine and dentistry and chief of the division of medical services of the Atomic Energy Commission, University of Rochester School of Medicine, for the Cortland County Medical Society on June 25 The Council Committee on Public Health and Education of the State Medical Society and the New York State Department of Health sponsored the instruction

Dutchess County

At the June 16 meeting of the Dutchess County Medical Society, Dr Raymond D Fear, Ithaca, spoke on ' Health Problems in Dutchess County "

Erie County

Members of the Medical Society of the County of Erie will be guests of the board and staff of the Sisters of Charity Hospital, Buffalo, on September 15, when they will be escorted on a tour of the new hospital building

The Physicians Emergency Service Referral List of the Medical Society of the County of Erie, public service project of the society, was put into active effect and operation on July 15 Designed to make it possible for any resident of the Buffalo area to obtain emergency medical service at any hour of the night or day, the Referral List consists of the names of 32 physicians who have agreed in writing to respond to calls from anyone needing the services of a physician who is unable to reach his family doctor or who has no family physician

Cards setting forth procedural instructions on one side and the list of available doctors on the other side were distributed to fire houses, police stations, Buffalo area hospitals and local "leave-word" services The seeker after medical service is provided with names of doctors from the list and then makes his own choice and puts through his own call

The Erie County Medical Society staged its first annual sports day and dinner in August The Committee on Arrangements was composed of Dr Kenneth G Jahraus, Dr Grant T Fisher, Dr Allen E Richter, Dr Joseph R. Saab, and Dr George E Slotkin The proposal of the stag get-together and fresh-air outing was made by Dr E Dean Babbage, county society president

Fulton County

Members of the Fulton County Medical Society and the staff of the Nathan Littauer Hospital held their annual outing June 23 in Bleecker Dr John Clemans was chairman of the committee on arrangements

Greene County

The annual dinner meeting and ladies' night of the Greene County Medical Society was held on July 13 at the Catskill Country Club

At a brief business session, presided over by Dr William Petry, president, nominations for office, to be filled at the October meeting, were made as follows president, Dr Michael Viviano, vice-president, Dr M K Colle, secretary, Dr William M Rapp, treasurer, Dr Mahlon H Atkinson, chairman legislative committee, Dr P G Waller, public relations and public health, Dr Alton B Daley, delegate to the State convention, Dr Kenneth Bott

Guest speaker for the occasion was William Martin, attorney for the New York State Medical Society

A highlight of the gathering was the honoring of four Greene County physicians, Drs Percy Waller of New Baltimore, William H Newcomb of Cairo, and William M Rapp and Frederick W Goodrich of Catskill, who have reached the fiftieth milestone in the practice of medicine

Jefferson County

Dr Paul A. Bunn, associate professor of medicine at Syracuse University College of Medicine, spoke on "The New Antimicrobial Agents" at the June meeting of the Jefferson County and St Lawrence County Medical Societies at the Thousands Islands Country Club, Alexandria Bay The meeting was also the annual field day outing of members of the two societies

Kings County

Dr Harold Levy has been elected president of the pediatric section of the Kings County Medical Society Other officers elected were Dr Samuel Silber, vice-president, Dr Jacob J Lichterman, secretary, and Dr Irving Weinstock, treasurer

Dr Levy is associate attending pediatrician at

[Continued on page 1864]



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[Continued from page 1862]

Beth-El and Brooklyn Women's Hospitals and assistant attending physician at Kingston Avenue Hospital

Monroe County

Miss Helen R Guntert has been named executive secretary of the Medical Society of the County of Monroe, according to an announcement by Dr Ellis B Soble, president She will also serve as managing editor of *The Bulletin*, the official publication of the medical profession of Monroe County

A large turn-out of Monroe County Medical Society members and insurance representatives heard a panel discussion on Workmen's Compensation matters at the Rochester Academy of Medicine auditorium on May 11 Dr Charles S Lakeman, as moderator, introduced Dr David Kalish, director of the Workmen's Compensation Bureau of the New York State Medical Society, Henry D Sayer, general manager of the Compensation Insurance Rating Board of New York State, and John DuLaney, president of the Rochester Adjuster's Club

Dr Albert D Kaiser spoke briefly on the progress of the Council of Rochester Regional Hospitals, Dr Herbert R Brown, Jr , discussed the Red Cross Blood Bank, and Dr Ellis B Soble reported on the Medical Service Bureau

New York County

Dr John J H Keating was elected president-elect of the Medical Society of New York in May Other officers elected were Dr Kenneth M Lewis, vice-president, Dr B Wallace Hamilton, secretary, Dr Frederick H Amendola, assistant secretary, Dr Condict W Cutler, Jr , treasurer, and Dr John H Garlock, assistant treasurer Dr William B Rawls, elected a year ago, took office in May, succeeding Dr Harold B Davidson.

Oneida County

The Oneida County Medical Society is preparing a list of physicians who are willing to accept emergency calls from city police, firemen, and State police The plan was approved at the society's annual outing July 13 Speaker at the gathering was Dr Leo F Simpson, president of the State Medical Society, who urged each physician to participate fully in all the many activities of the Society

Ontario County

Dr J Tolmach, compensation medical examiner, New York State Workmen's Compensation Board, New York State Department of Labor, and Dr Stuart L Vaughan, assistant professor of medicine at the University of Buffalo School of Medicine, addressed the Ontario County Medical Society at a meeting on July 13 in Geneva

Dr Tolmach's subject was the evaluation of disability and Dr Vaughan spoke on the treatment of blood diseases

This postgraduate instruction was arranged by the Medical Society of the State of New York with the cooperation of the New York State Department of Health

Orange County

Dr Milton Helpern, deputy chief medical examiner of New York City and professor of medical jurisprudence at New York University, discussed the value of the medical examiner system over that of coroners at a joint meeting of the Orange County Medical Society and the County Bar Association on June 18 Other speakers at the dinner meeting included Dr Theodore Proper of Newburgh, president of the Orange County Medical Society, Dr William E Kelly, Middletown, chairman of arrangements for the meeting, and Supreme Court Justice Jacob Livingston of Kings County

Otsego County

Dr Rudolph Ruedemann, Jr , associate professor of dermatology and syphilology at Albany Medical College, spoke at the meeting of the Otsego County Medical Society on June 16 His subject was "Common Skin Diseases, Diagnosis and Treatment"

Putnam County

Dr Robert Cleaver of Brewster was elected president of the Putnam County Medical Society at its annual meeting, June 2 Other officers elected for the ensuing year are Dr Ralph Hall of Cold Spring, vice-president, Dr Ferdinand Lehr of Carmel, secretary, Dr George Steacy of Mahopac, treasurer

Rockland County

Dr Orren D Chapman, professor of bacteriology and parasitology at Syracuse University College of Medicine, and Dr George H Reifenstein, associate professor of pathology at Syracuse University College of Medicine, addressed the Rockland County Medical Society and the Rockland County Dental Society at a recent meeting at the Summit Park Sanatorium, Pomona

The subject for the evening was "Bacterial Flora of the Mouth in Relation to Subacute Bacterial Endocarditis and Other Diseases" Dr Chapman discussed bacteriology and pathology and Dr Reifenstein talked on diagnosis and treatment

Saratoga County

The Saratoga County Medical Society held a meeting on July 13, at the Saratoga Hospital. Arrangements were made for the annual meeting of the Fourth District Branch of the State Medical Society, to be held in Saratoga Springs, September 24 and 25

St Lawrence

Members of the St Lawrence County Medical Society and Woman's Auxiliary met at the Massena Country Club on June 24 for a joint luncheon and separate business meetings. The Medical Society heard an address by a Red Cross representative, and the Auxiliary had a social hour

Suffolk County

Postgraduate instruction will be given for the Suffolk County Medical Society on Thursday morning, August 26, at 11 30 A M , at Mather Memorial Hospital, Port Jefferson, Long Island Dr Claude E Heaton, associate professor of obstetrics and gynecology, New York University, will speak on "The Management of Difficult Labor" Dr John S Labate, instructor in obstetrics and gynecology, New York University, will have as his subject, "The Recognition and Prevention of Injuries and Diseases of the Fetus"

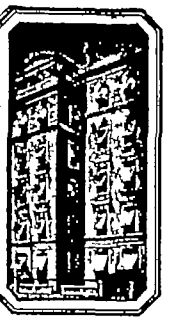
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FORTY-SECOND ANNUAL MEETINGS

of the

DISTRICT BRANCHES

of the

MEDICAL SOCIETY OF THE STATE OF NEW YORK

PROGRAMS

Fifth District Branch

Tuesday, September 14, 1948
Y M C A Building and Black River Valley Club
Watertown, New York

Noon Session

12 00–4 00 P M —Luncheon for hospital representatives and physicians, Ballroom, Black River Valley Club

Panel Discussion—"Hospital Problems"

Moderator John J Bourke, M D, Albany, executive director, Joint Hospital Survey and Planning Commission

Malcolm T MacEachern, M D, Chicago, director of hospital activities, American College of Surgeons

Finla G Crawford, Ph D, Syracuse, vice-chancellor, Syracuse University

Edward J Noble, New York, chairman, North Country Hospitals Corporation

Esther Thompson, R N, Rochester, director of nursing education, University of Rochester

H C Stephenson, Utica, managing director, Hospital Plan, Inc

Afternoon Session

2 30 P M —For physicians, Y M C A Building

"The Physicians' Legal Problems"
Thomas Clearwater, Esq, attorney, Medical Society of the State of New York

"Handling of Surgical Emergencies"
William S Brady, M D, Utica
Discussion Dan Mellen, M D, Rome

"The Use and Abuse of Some of the Newer Medications"
Richard H Lyons, M D, Syracuse, professor of medicine, Syracuse University
Discussion George F Bock, M D, Watertown

Clinicopathologic Conference
Martin F Hilfinger, Jr, M D, Syracuse, department of pathology, Syracuse University
Medical Case Discussion Olin J Mowry, M D, Oswego
Surgical Case Discussion Murray M Gardner, M D, Watertown

Evening Session

6 00 P M —Social Hour for physicians and wives, hospital representatives and members of the Woman's Auxiliary, Black River Valley Club

6 30 P M —Dinner (Informal)

Introduction of officers of the Medical Society of the State of New York

Address by Leo F Simpson, M D, President, Medical Society of the State of New York

Remarks by Mrs Edgar M Neptune, President, Woman's Auxiliary to the Medical Society of the State of New York

"Trends in Hospital Administration"
Malcolm T MacEachern, M D, director of hospital activities, American College of Surgeons

The Executive Committee of the Fifth District Branch will donate a prize of $25 to that Woman's County Auxiliary from which county there is the largest percentage of physicians registered at this meeting

Officers—Fifth District Branch

President	James E McAskill M D, Watertown
First Vice-President	Wardner D Ayer M D, Syracuse
Second Vice-President	Arthur F Gaffney M D, Clinton
Secretary	Richard B Cuthbert Jr, M D, Canastota
Treasurer	Donald C Tulloch, M D., Ogdensburg

Presidents of Component County Societies

Herkimer	Robert W Dennis, M D Herkimer
Jefferson	L. Otis Fox M D, Brownville
Lewis	Louis A Avallone M D Lowville
Madison	Richard B Cuthbert, Jr, M D Canastota
Oneida	James I Farrell M D Utica
Onondaga	J G Fred Hiss M.D, Syracuse
Oswego	John L H Mason M D Pulaski
St Lawrence	Philip T McGreevy M D Massena

Eighth District Branch

Thursday, September 16 1948
U.S Veterans Administration Facility
Batavia, New York

Afternoon Session

2.30 P.M.—"The Prevention and Treatment of Acute Infections of the Respiratory Tract"
Hobart A. Reimann, M D professor of medicine, Jefferson Medical College of Philadelphia
"The Present Day Status of Fractures of the Hip Joints Management and Treatment of Fractures About the Shoulder Joint"
Anthony F DePalma, M D., Philadelphia

6.30 P.M.—Dinner
Presbyterian Church Building
Introduction of Officers of the Medical Society of the State of New York
Address by Leo F Simpson, M D., Rochester, President Medical Society of the State of New York
Remarks by Mrs Edgar M Neptune President Woman's Auxiliary to the Medical Society of the State of New York
"The Technic of Successful Living"
The Reverend Norman Vincent Peale, D.D pastor of Marble Collegiate Church New York City The Rev Dr Peale conducts the radio program "The Art of Living"

Ladies will join the members of the District Branch for dinner

Officers—Eighth District Branch

President	Robert C Peale, M.D., Olean
First Vice-President	John C Kinsly M.D North Tonawanda
Second Vice-President	Henry S Martin M D, Warsaw
Secretary	Ralph M Bruckheimer M D Cassadaga
Treasurer	Sydney L McLouth, M D., Corfu

Presidents of Component County Societies

Allegany	Raymond O Hitchcock, M D Alfred
Cattaraugus	Norman P Johnson, M D Olean
Chautauqua	Everett O Black M D, Fredonia
Erie	E. Dean Babbage M D., Buffalo
Genesee	David B Johnson, M.D., Batavia
Niagara	William W Pierce, M.D, Lockport
Orleans	Angelo F Leone M D, Medina
Wyoming	Oliver T Ghent, M D Warsaw

FIRST LAW REGULATING MEDICAL PRACTICE

The earliest records of the territory included in what is now the present City of New York are "The Minutes of the Burgomasters and Scheppens (Aldermen) of New Amsterdam for the years 1653–1664 These records, contained in six manuscripts written in the Dutch language are preserved in the library of the City Clerk Manhattan.

In 1848 the Common Council commissioned Edmund B O Callaghan, M.D a competent Dutch scholar and historian to translate the volumes These records make possible a study of the early growth of the city government The State of New York, then called New Netherland, was headed by Peter Stuyvesant (1647–1664) The earliest law regulating the practice of medicine is a directive issued by *Stuyvesant on December 3 1657*

All surgeons in this City are hereby notified that the court orders them to inquire of their patient whenever they dress a wound who has wounded him and then report it to the Shout (Sheriff) or failing therein they are to pay the fine imposed for making the wound

The fine imposed for making a wound was 25 pounds flemish paid in wampum, four times as much was paid by the person causing the wound if the victim bled.—*New York Medicine July 20 1948*

Officers—County Medical Societies—1948

TOTAL MEMBERSHIP AS OF AUGUST 15, 1948—22,067

County	*President*		*Secretary*		*Treasurer*	
Albany	J J Clemmer	Albany	A. Vander Veer	Albany	F E Vosburgh	Albany
Allegany	R O Hitchcock	Alfred	H. G Chamberlin	Cuba	L P Bly	Cuba
Bronx	S Weiskopf	Bronx	G B Gilmore	Bronx	C W Frank	Bronx
Broome	J C Zillhardt	Binghamton	R. S McKeeby	Binghamton	J W Kane	Binghamton
Cattaraugus	N P Johnson	Olean	W B Arthurs	Olean	George C Cash	Olean
Cayuga	C T Yarington	Moravia	J D Hammond	Auburn	L H Rothschild	Auburn
Chautauqua	E O Black	Fredonia	Edgar Bieber	Dunkirk	C E Hallenbeck	Dunkirk
Chemung	A. C Glover	Elmira	H. A. Burch	Elmira	E S Ridall	Elmira
Chenango	J A. Hollis	Norwich	J H. Stewart	Norwich	J H. Stewart	Norwich
Clinton	W W Johnson	Plattsburg	K. M Clough	Plattsburg	K. M Clough	Plattsburg
Columbia	L D Carpenter	Germantown	L J Early	Hudson	L J Early	Hudson
Cortland	R. H Kerr	Cortland	E F Higgins	Cortland	F F Sornberger	Cortland
Delaware	C K. Ives	Roxbury	S G Edgerton	Delhi	S G Edgerton	Delhi
Dutchess	L W Stoller	Poughkeepsie	J F Rogers	Poughkeepsie	J F Rogers	Poughkeepsie
Erie	E D Babbage	Buffalo	H. G Walker	Buffalo	E A. Woodworth	Kenmore
Essex	R J Martin	Ticonderoga	J E Glavin	Port Henry	J E Glavin	Port Henry
Franklin	A. A. Hartmann	Malone	D H Van Dyke	Malone	D H Van Dyke	Malone
Fulton	D. M McMartin	Johnstown	R. K. Lenz	Gloversville	W H Raymond	Johnstown
Genesee	D B Johnson	Batavia	C C Koester	Batavia	C C Koester	Batavia
Greene	W A. Petry	Catskill	W M Rapp	Catskill	M H. Atkinson	Catskill
Herkimer	R. W Dennis	Herkimer	R C Ashley	Little Falls	R C Ashley	Little Falls
Jefferson	L O Fox	Brownville	C A. Prudhon	Watertown	L E Henderson	Watertown
Kings	A. W M Marino	Brooklyn	C H. Loughran	Brooklyn	H Mandelbaum	Brooklyn
Lewis	L A. Avallone	Lowville	E A. Barnes	Lowville	E A. Barnes	Lowville
Livingston	F J Hamilton	Hemlock	R. A. Hemphill	Mt Morris	R A Hemphill	Mt Morris
Madison	R B Cuthbert	Canastota	F O Pfaff	Oneida	J F Rommel	Oneida
Monroe	E B Soble	Rochester	J A Lane	Rochester	J L Norris	Rochester
Montgomery	R. E Wytrwal	St. Johnsville	D W Childs	Amsterdam	F F Pipito	Amsterdam
Nassau	H. A Butman	Manhasset	I Drabkin	Rockville Centre	I Drabkin	Rockville Centre
New York	William B Rawls	New York	B W Hamilton	New York	C W Cutler	New York
Niagara	W W Pierce	Lockport	C M Dake	Niagara Falls	F A. Lowe	Niagara Falls
Oneida	James I Farrell	Utica	H H Dodds	Utica	R C Hall	Utica
Onondaga	J G F Hiss	Syracuse	I L Ershler	Syracuse	A. C Hofmann	Syracuse
Ontario	L A. Stetson	Canandaigua	P M Standish	Canandaigua	P M Standish	Canandaigua
Orange	T R Proper	Newburgh	E C Waterbury	Newburgh	E C Waterbury	Newburgh
Orleans	A. F Leone	Medina	J G Parke	Albion	J G Parke	Albion
Oswego	J L H Mason	Pulaski	U Cimildoro	Oswego	U Cimildoro	Oswego
Otsego	E J Keegan	Oneonta	J M Constantine	Oneonta	J M Constantine	Oneonta
Putnam	R S Cleaver	Brewster	F J A Lehr	Carmel	G H Steacy	Mahopac
Queens	Alfred Angrist	Jamaica	E A. Wolff	Forest Hills	D M Raskind	Long Island City
Rensselaer	C J Handron	Troy	H F Albrecht	Troy	H C Engster	Troy
Richmond	J H Diamond	New Brighton	R E Lucey	Stapleton	H Dangerfield	St George
Rockland	G G Stone	Suffern	R. L Yeager	Pomona	M R Hopper	Nyack
St. Lawrence	P T McGreevy	Massena	C F Prairie	Massena	L T McNulty	Potsdam
Saratoga	F A. Mastrianni	Mechanicville	M J Magovern	Saratoga	J M Lebowich	Saratoga
Schenectady	N H. Rust	Scotia	R. E Isabella	Schenectady	Harry Miller	Schenectady
Schoharie	J H. Wadsworth	Cobleskill	D R. Lyon	Middleburg	D L Best	Middleburg
Schuyler	F C Ward	Odessa	C W Schmidt	Montour Falls	C W Schmidt	Montour Falls
Seneca	C M Smith	Waterloo	Bruno Riemer	Romulus	Bruno Riemer	Romulus
Steuben	V S Higby	Bath	R J Shafer	Corning	R J Shafer	Corning
Suffolk	W S Stakes	Patchogue	E P Kolb	Holtsville	G A. Sillman	Sayville
Sullivan	R. S Breakey	Monticello	D S Payne	Liberty	D S Payne	Liberty
Tioga	A. J Capron	Owego	I N Peterson	Owego	I N Peterson	Owego
Tompkins	H. W Ferris	Ithaca	Richmond Douglass	Ithaca	Richmond Douglass	Ithaca
Ulster	E S Goodyear	Kingston	F H Voss	Phoenicia	H B Johnson	Kingston
Warren	Saul Yafa	Glens Falls	A. C Davis	Glens Falls	A C Davis	Glens Falls
Washington	R. L Skinner	Greenwich	D M Vickers	Cambridge	C A Prescott	Hudson Falls
Wayne	J H Arseneau	Lyons	I M Derby	Newark	I M Derby	Newark
Westchester	W G Childress	Valhalla	W A Kelly	Mount Vernon	R. R Heffner	New Rochelle
Wyoming	O T Ghent	Warsaw	P A. Burgeson	Warsaw	P A. Burgeson	Warsaw
Yates	R. H Davis	Penn Yan	W G Roberts	Penn Yan	W G Roberts	Penn Yan

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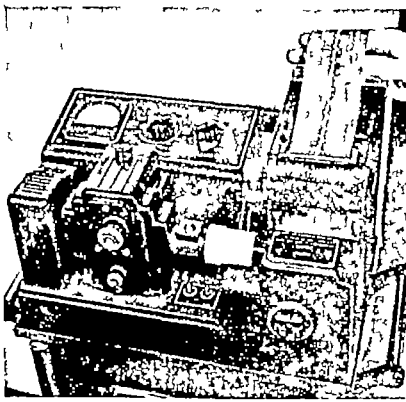


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NEW YORK STATE JOURNAL OF MEDICINE

VOLUME 48 SEPTEMBER 1, 1948 NUMBER 17, PART II

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INDEX

(All references are to sections)

Addresses
President Bauer, 19, 66, 141
President-Elect, 1948, Simpson, 20
President-Elect, 1949, Masterson, 125
Advertising, NEW YORK STATE JOURNAL OF MEDICINE, 24, 48
Alcoholism
Special Committee on, 46, 160
Study by New York State Department of Health, 51, 161
Alameda County (California) Plan, 65, 103
American Association of Blood Banks, 33, 168
American Medical Association
Constitution Change in Regard to Acceptance for Membership of Doctors in County Medical Societies Irrespective of Race, Color, or Creed, 38, 49, 108
National Council for Emergency Medical Service, 19, 66, 141
Secretary and General Manager, Introduction, 60
Voluntary Insurance, 25, 83
Announcements Banquet Tickets, Radio Broadcast Tickets, Veterans Medical Service Plan of New York, Inc , Meeting, 56
Articles on the Subject of Medicine, Publication of, 44, 131
Automobile Agency, 93, 169

BCG Immunization, 149
Blood Banks, American Association of, 33, 168
Blood Donor Service Program, Red Cross, 32, 168

Cancer, 11, 148
Censors, Report of, 72
Chest Session—Change to Section, 40, 73
Committee of the Whole (Executive Session), 120
Constitution and Bylaws
Amendment Disapproved
Article VI, Constitution, Chapter III, Section 3 Bylaws (Trustees), 87
Amendments Proposed in 1948 for House Action in 1949
Article XI (District Branches), 171
Workmen's Compensation, Enlargement of Council Committee on, 45, 88
Provision for One Extra Meeting of House of Delegates Each Year, 129
General Amendment to Bylaws by Dr Rooney, 177
Convention Committee, Report, 78
County Health Departments and Rural Medical Service, 99
Credentials, 1
Cults, Subcommittee on, of the Council Committee on Legislation, 61, 105, 106

Delegates from Other State Medical Societies, 21, 59, 109
Directory, 16, 17, 85, 132, 133, 134
District Branches
Redistricting, 91, 143
Reports, 71
Draft of Physicians into Military Service, 69, 170
Dues Assessments—Exemption of Payment by Men in Military Service, 28, 86

Economics Committee, Report, 63, 163
Education Law, Amending Law to Change Section 6501, Definition, 13, 55, 117
Elections, 121
Emergency Preparedness Committee, Proposal to Create, 19, 66, 141
Ethics, Question on, 79
Executive Session, 101

Federal Funds for Pediatric Undergraduate, Graduate, and Postgraduate Education, 43, 119

Geriatrics, 12, 157
Group Practice, 37, 115

Hard of Hearing and the Deaf, 150
Honorary Membership, Election of Dr Robert F Barber, 122
Hospital Lien Law to Include Physicians' and Surgeons' Bills, Amendment of, 42, 113
Hospital and Medical Care for Veterans, 26, 138
Hospitals, Practice of Medicine by, 92, 165
House of Delegates
Advisability of Holding Special Meeting in 1948, 130
1949 Meeting, 173

India Medical Association, Introduction of Secretary, 22
Industrial Health, 98
Insurance Forms, 68, 166
Isotope Committee, 67, 162

JOURNAL, 16, 17, 132, 133, 134

[Continued on page 6]


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VOLUME 48 SEPTEMBER 1 1948 NUMBER 17 PART II

Minutes of the House of Delegates, 1948

For the convenience of the membership of the Medical Society of the State of New York the Publication Committee this year presents the minutes of the House of Delegates in a new and improved manner for the first time. Formerly, the transactions were printed in serial form through a number of issues of the NEW YORK STATE JOURNAL OF MEDICINE. Henceforth, they will be published complete with index in a single volume as a second section to one of the regular issues of the JOURNAL, this year the September 1 issue.

The editors feel sure that you will welcome this opportunity to familiarize yourselves with the most recent actions of your duly elected legislative body A well informed membership is the mark of a progressive society

To give some indication of the importance of the deliberations of your House of Delegates, a few facts about medical affairs in your State may be in order

One fifth of all interns in the United States receive their training in New York State hospitals, one fourth of all United States physicians serve their residencies in New York State hospitals, thirteen per cent of all prescriptions are prescribed by New York State physicians, almost half of the 22,717 New York State physicians are specialists, one-eighth of all the hospital beds are in New York State hospitals

New York State is not only the largest state with respect to population and number of physicians, but continues to be the fastest growing state also, based on the number of *new physicians* who are licensed to practice medicine each year Last year over 1,100 new physicians joined the Medical Society of the State of New York, and this year the number has continued to grow, until now our membership stands at 22,717, twice as many member physicians as the next largest state

Thus, New York, with 15 per cent of all the physicians in the United States occupies a key position in the national medical picture Hand in hand with this tremendous growth has gone New York's progressive spirit of medical leadership, which, at the very beginning, brought about the establishment of the American Medical Association (1847) and later the United States Pharmacopeia Today New York is taking the leadership in much of the battle against socialized medicine and antivivisection, and for licensing reforms, prepayment medical

care plan insurance, chiropractic control measures, better postgraduate medical education, particularly for the general practitioner, and a host of other problems of the day

The transactions of the House of Delegates contain in detail all the resolutions presented, the action of the reference committees and the reports of the Council Committees The new Minutes presentation with its index should facilitate and simplify the problem of finding any action of the House of Delegates

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INDEX

[Continued from page 2]

Laboratory and Diagnostic Services, State Expansion of, 90, 136
Legislative Committee
  Activities, 41, 114
  Fino-Clancy X-ray Bill, 15, 107
  Fino-Hanniford Bill, 15, 107
  Young-Graci Bill, 15, 107

Malpractice Insurance and Defense Board
  Report, 23, 30, 102
  American Policyholders Insurance Company, 30, 102
  Group Plan, 23, 102
Malpractice Insurance and Public Relations Alameda County Plan (California), 65, 103
Maternal and Child Welfare, 10, 118
Medical Care Insurance, 82
Medical Licensure, 74
Membership
  Election of Retired Members, 124
  Honorary, Dr Robert F Barber, 122
  Junior Classification in County Societies and State Medical Society on Reduced Assessment, 35, 146
  Transfer from Retired to Active, Dr William Hinz, 123
Memorials and Tribute
  Dr Frederic E Sondern, 18
  Dr Robert Brittain, 18
Mental Hygiene, 151
Minutes of 1947 Session, 2

National Council for Emergency Medical Service, 19
Nursing Education, 76, 110
Nutrition, 158

Office Administration and Policies, 75

Partnership and Group Practice, 37, 115
Pediatric Undergraduate, Graduate, and Postgraduate Education, 43, 119
Physical Medicine, 159
Planning Committee for Medical Policies
  Report, 8, 142, 153
  Reappointment of Committee, 172
Podiatry, Legislation, 53, 112
Postgraduate Medical Education, 9, 97
Practice of Medicine by Hospitals, 92, 165
Premarital Blood Tests, 58, 154
President's Report (Dr Bauer), 19, 66, 141
President-Elect, Remarks
  (Dr Simpson), 20
  (Dr Masterson), 125
Prize Essay Committee, Report, 127
Public Health and Education, Committee on, 9, 97
Public Health Physicians, Salary Scales in New York State Department of Health, 50, 100
Public Medical Care, 164
Publication of Articles on Subject of Medicine, 44, 79, 131
Publication Committee, 16, 17, 132, 133, 134
Publicity, Premature, of Medical Matters by State Officers, 89, 135

Reference Committees, 3, 4, 47
Rehabilitation, 156
Retired Members, Election, 124
Rheumatic Fever, 152
Rural Medical Service, 99

Salary Scales for Public Health Physicians in New York State Department of Health, 50, 100
Scientific Awards Committee, Report, 147
Scientific Medical Advertising in NEW YORK STATE JOURNAL OF MEDICINE, 134
Secretary's Report, 70
Speaker, Opening Remarks, 18
Specialty Boards, Resolution Adopted, 52, 81
State Legislation Qualifying the Title "Dr," 34, 144

Temporary Commission on Coordination of State Activities—Wicks Commission, 64, 111
Treasurer's Report, 5, 6, 85
Trustees' Report, 7, 85
Trustees and Treasurer, Reports, 5, 6, 7, 85

Veterans Administration 62, 139
  United States, Liaison Committee, Report, 104
Veterans, Hospital and Medical Care, 26, 138
Vice-President (Dr Curphey), Remarks, 126
Voluntary Health Insurance Plan, Resolution, 29, 167
Vote of Thanks
  Scientific Program, Scientific Exhibits, Convention, Program, and Arrangements Committees, 128
  Speaker, 176
  Exhibitors and Hotel Management, 175

United Medical Service, Rates of Doctors in, 31, 84

War Memorial, 14, 137, 140, 174
Wicks Commission—Temporary Commission on Coordination of State Activities, 64, 111
Woman's Auxiliary Resolution Adopted, 27, 77, 80
Workmen's Compensation
  Amend Law to Abolish Medical Practice Committee, 57, 94
  Enlargement of Council Committee, 45, 88
  Fee Schedule, 54, 95
World Health Organization, U S Participation, 39, 145
World Medical Organization, 19

X-ray as a Practice of Medicine, 36, 116

THE 1948 ANNUAL MEETING

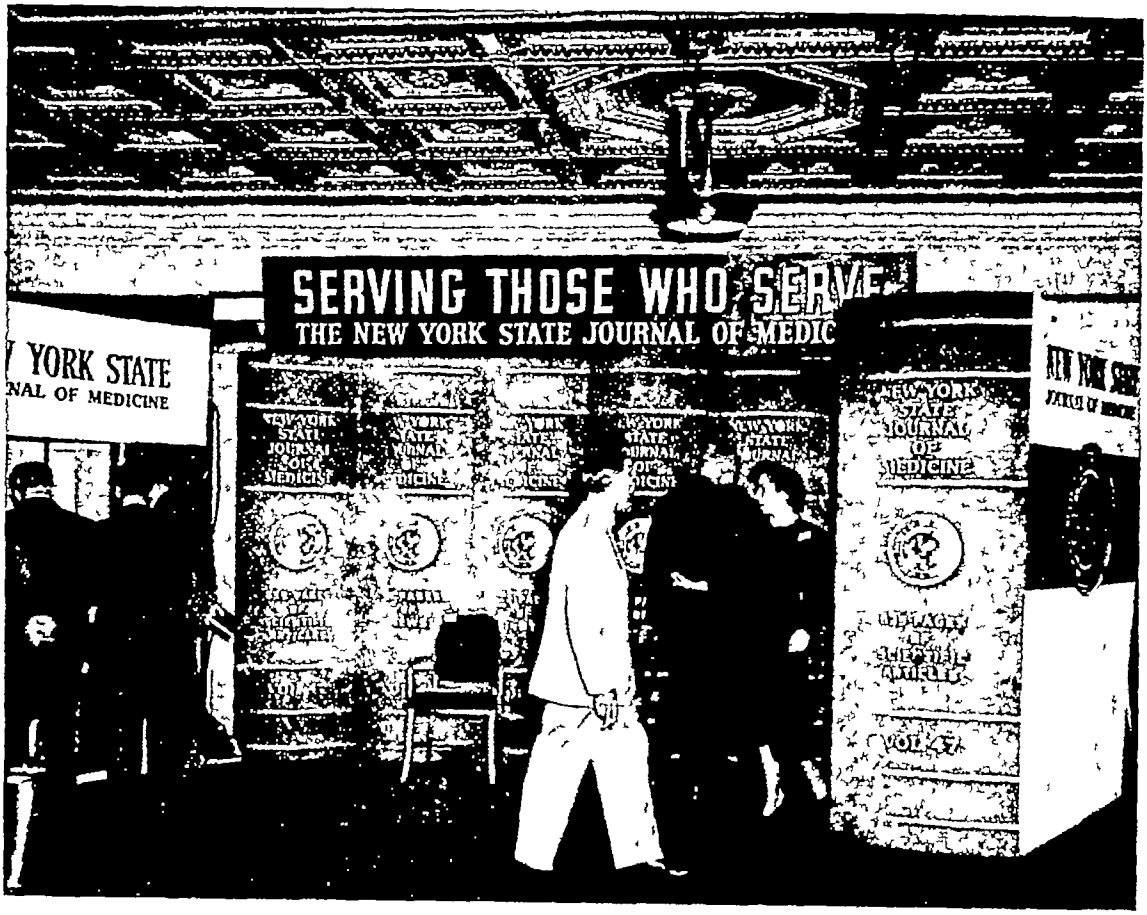


Leaders of the Medical Society of the State of New York—past, present, and future—shown at the 142nd Annual Meeting held in New York City from May 17 to May 21, 1948 Above, left to right **Louis H Bauer, M.D**, Hempstead, past-president, **Leo F Simpson, M.D**, Rochester, president, and **John J Masterson, M D**, Brooklyn, president-elect



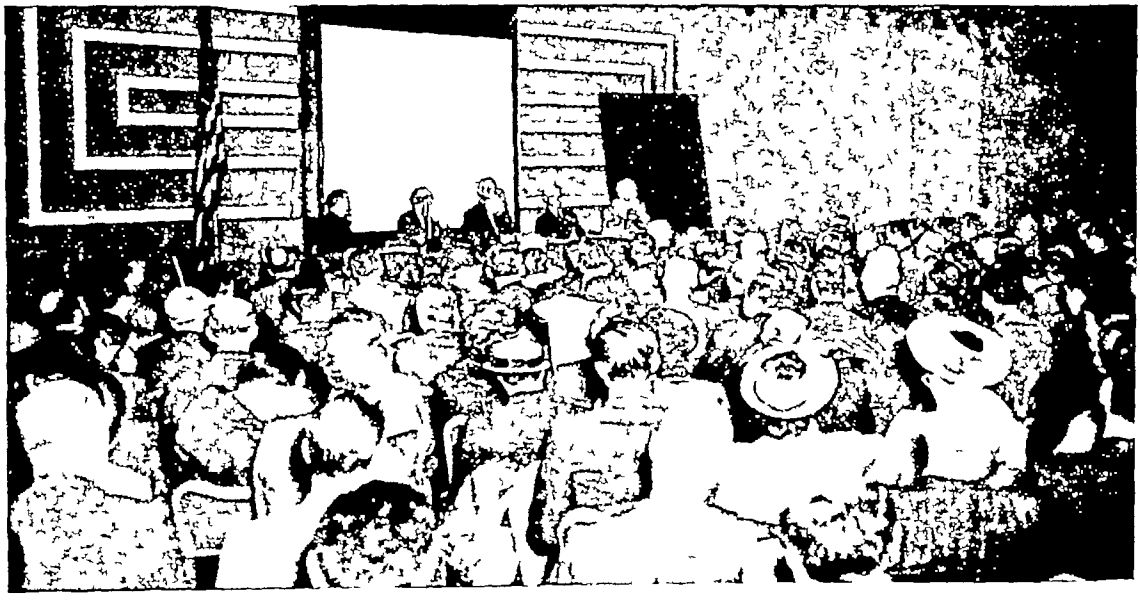
At right, **Albert F R. Andresen, M.D**, Brooklyn, speaker, who presided at the 1948 meeting of the House of Delegates of the State Society

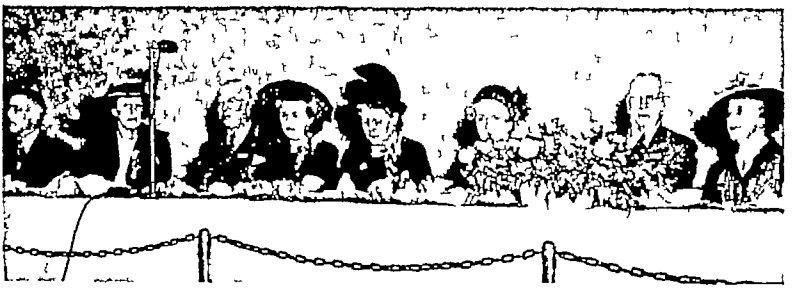
Attendance at the five-day session totaled 6,020, including physicians, exhibitors, members, and guests



A popular exhibit (above) was huge display of the JOURNAL, featuring two picture booths, where delegates and guests received souvenir pictures of themselves—"Partners in Service—You and the Journal"

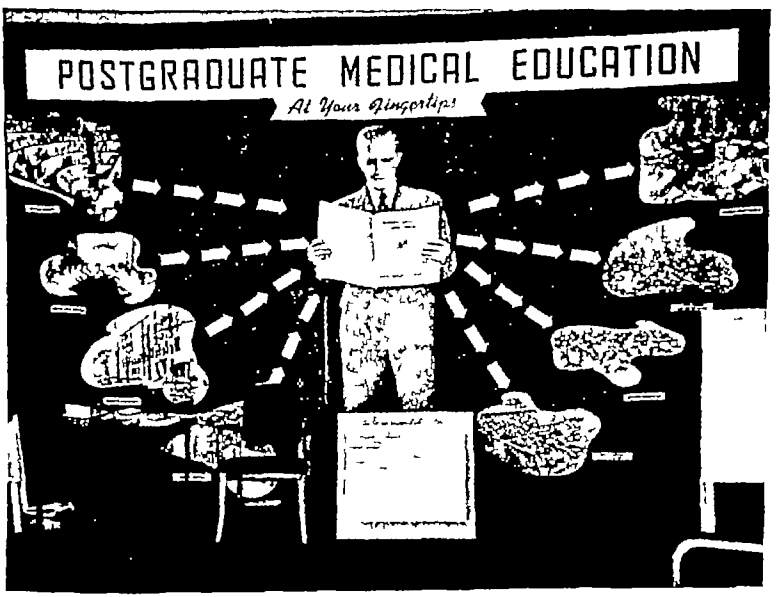
Physicians from metropolitan area and all over State crowded into scientific sessions and Teaching Day programs, as in panel discussion meeting shown below



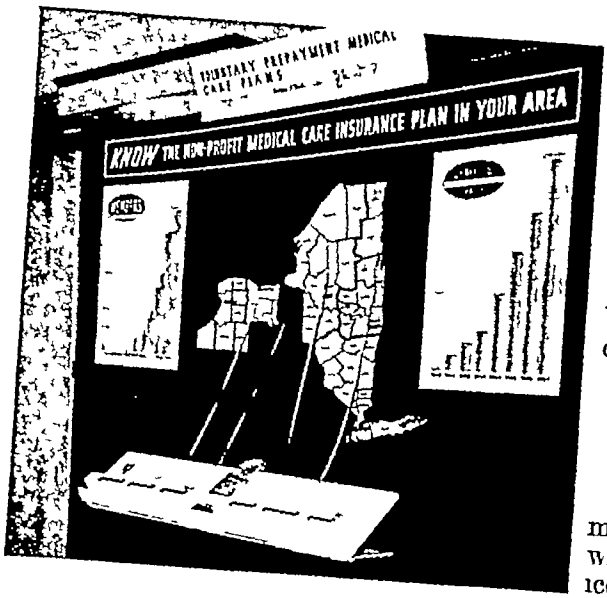


At luncheon of the Woman's Auxiliary to the Medical Society of the State of New York, held during Annual Meeting—above, left to right Dr Harry F Pohlmann, Mrs. Edgar M Neptune, president of the State Auxiliary, Dr Fenwick Beekman, chairman of the Auxiliary Advisory Council of the State Society, Mrs. Harry F Pohlmann, retiring president of the State Auxiliary, Mrs J Emerson Noll, First District Councilor, Mrs Eustace Allen, retiring president Woman's Auxiliary to the American Medical Association, Dr Nathan B Van Etten, member of the Advisory Council, and Mrs Luther H. Kice, president of the Woman's Auxiliary to the A M A

Display at Annual Meeting showing scope and activities of the postgraduate medical education arranged by the Council Committee on Public Health and Education, O W H Mitchell, M D , chairman



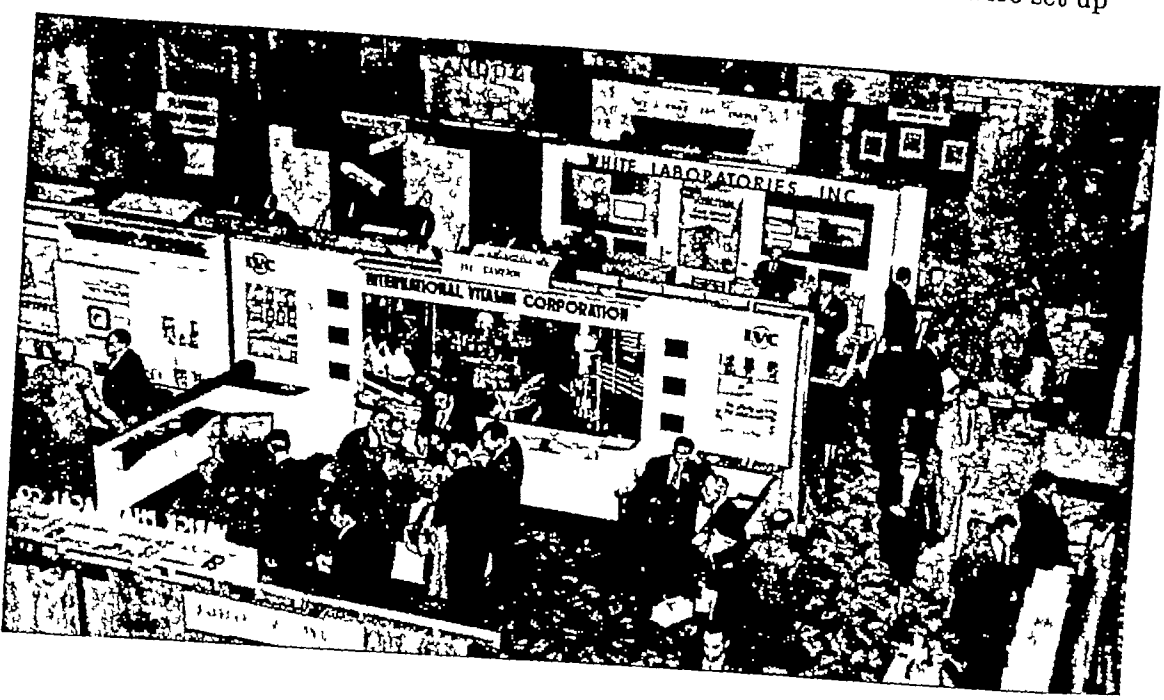




Much interest was evidenced in display of *20,000 Years of Service*, book published by State Society honoring physicians who have served fifty years or more

Medical Care Insurance plans in New York State were explained at colorful exhibit of this Department

Members and guests used many spare moments to visit the Technical Exhibits where new and improved products and services of over 100 companies were set up



Medical Society of the State of New York

House of Delegates

Minutes of the Annual Meeting

May 17 to May 19, 1948

THE 142nd Annual Meeting of the House of Delegates of the Medical Society of the State of New York was held at the Hotel Pennsylvania, New York City, on Monday May 17, 1948, at 10 15 A.M., Dr Albert F R. Andresen *Speaker* Dr Nelson W Strohm *Vice-Speaker* Dr Walter P Anderton, *Secretary* Dr W Guernsey Frey Jr *Assistant Secretary*

SPEAKER ANDRESEN Will the meeting please come to order?

We will now ask for the report of the Reference Committee on Credentials, Mr Secretary

SECRETARY ANDERTON The Reference Committee on Credentials reports there are no disputed delegates, and all on our rolls are entitled to vote.

SPEAKER ANDRESEN I now declare the 142nd Session of the House of Delegates open for the transaction of business.

Section 1

Report of Reference Committee on Credentials

SPEAKER ANDRESEN We will now hear the report of the number of delegates registered from the Credentials Committee Dr McCarty Is there a quorum present?

DR. CHARLES F MCCARTY *Kings* There are registered 106 County Delegates, 14 Officers 7 Section Chairmen and 7 District Delegates

SPEAKER ANDRESEN A quorum is 60 delegates, so we have a quorum present, and can start the transaction of business

Section 2

Approval of the Minutes of the 1947 Session

SPEAKER ANDRESEN The next order of business is the approval of the minutes of the 1947 Session. These minutes have appeared in the August 1 and 15 September 1 and 15 October 1 and 15 and November 1 1947 issues of the NEW YORK STATE JOURNAL OF MEDICINE If there are no corrections or objections the minutes will stand approved as published

Are there any objections or corrections? Hearing none the minutes are declared approved as published

Section 3

Reference Committees

SPEAKER ANDRESEN In regard to the Reference Committees, the list of Reference Committee appointments has been published and all of the members of the Reference Committees have been written to In addition to that we have asked the chairman of each Reference Committee to communicate with the members of his committee and get their opinions in regard to the subjects that have been referred to them. We hope in that way to expedite the business of the House

The list of Reference Committees is as follows

REFERENCE COMMITTEE ON CREDENTIALS
Charles F McCarty *Chairman* Kings
Alfred K Bates, Cayuga
Goodlatte B Gilmore Bronx
George H Burgin, Herkimer
Samuel W Moore New York

REFERENCE COMMITTEE ON REPORT OF PRESIDENT (also Supplementary)
Philip D Allen, *Chairman*, New York
William J Tracy Steuben
Harold F Morrison First District Branch
William Klein Bronx
Francis G Riley Queens

REFERENCE COMMITTEE ON REPORTS OF SECRETARY CENSORS AND DISTRICT BRANCHES
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Raymond F Kircher Albany
Charles A. Anderson Kings
Frederick S. Wetherell, Onondaga
Morris R. Bradner Orange

REFERENCE COMMITTEE ON REPORTS OF TREASURER AND TRUSTEES
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Stephen R. Monteith, Rockland
John J Finigan Monroe
Homer J Dickerbocker, Ontario
William C. White New York

REFERENCE COMMITTEE ON REPORT OF PLANNING COMMITTEE FOR MEDICAL POLICIES
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Harry O. Guess Erie
E. C. Foster Yates
George C Adie, Westchester
Dwight V Needham Onondaga

REFERENCE COMMITTEE ON REPORTS OF MALPRACTICE INSURANCE AND DEFENSE BOARD AND LEGAL COUNSEL (also Supplementary)
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Harold B Davidson, New York
Harry S. Fish, Tioga
Daley C H Van Dyke, Franklin
Henry E. McGarvey Westchester

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Ezra A. Wolf Queens
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Paul F Wilwerth, Schuyler
Donald E. McKenna, Kings
Kenneth F Bott, Greene

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E. Kenneth Horton, Nassau
Edgar Bieber Chautauqua
William A. Peart Niagara

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County Health Departments
Rural Medical Service

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Vincent Juster, Queens
Leo Schwartz Kings
Claude C Nuckols Jr Albany
Elton R. Dickson Broome

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Hard of Hearing and the Deaf
Mental Hygiene
Homologous Serum Jaundice
BCG Immunization
Rheumatic Fever

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Maxwell D Ryan Section Delegate
Donald Malven, Dutchess
W T Boland Chemung
Abraham M Rabiner Kings

REFERENCE COMMITTEE ON REPORT OF COUNCIL—PART V

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Nutrition
Geriatrics (also Supplementary)
Physical Medicine

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E L. Harmon Westchester
Madge C L McGuinness New York
John L Sengstack, Suffolk

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Economics (also Supplementary)
Public Medical Care
Joint Committee of the Hospital Association and the Medical Society of the State of New York
Medical Service

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Stephen H Curtis, Section Delegate
J E McAskill Jefferson
Porter A Steele, Erie
Frank J Cerniglia Queens

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War Memorial (also Supplementary)

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Olin J Mowry Oswego
Arthur J Fischl Queens
Ralph J Sheldon, Wayne

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Ivan N Peterson, Sixth District Branch
Charles S Lakeman Monroe
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Conventions
Medical Licensure
Nursing
Woman s Auxiliary (also Supplementary)
Office Administration and Policies
Ethics
Memorial

Joseph A Geis *Chairman* Essex
Burrill B Crohn, New York
John J Gainey, Kings
J Mott Crumb, Chenango
Moses A Stivers Orange

REFERENCE COMMITTEE ON MISCELLANEOUS BUSINESS A

Frederick Williams *Chairman*, Bronx
John Dugan Orleans
John F Kelley Oneida
Richard P Doody, Rensselaer
Joseph Tenopyr, Kings

REFERENCE COMMITTEE ON MISCELLANEOUS BUSINESS B

William B Rawls *Chairman*, New York
Joseph H Cornell, Schenectady
Morris Maslon Warren
Thomas M Brennan Kings
J Lewis Amster Bronx

SPEAKER ANDRESEN In these times of important changes taking place in medical practice, in education, and in our general way of living, the Speaker wishes to emphasize the importance of our reference committees It is to them that we look for a careful study of the reports and resolutions referred to them

It is very important that not only officers and committees whose reports are being considered should attend the meetings of these reference committees, but that anyone, whether a member of the House or not, who has any ideas or knowledge in regard to the subjects considered should go there to present them We can save much time of the House and have a much more thorough study if those matters are thoroughly thrashed out in committee instead of on the floor of the House

We have boards set up here on which we would ask the chairmen of the reference committees please to put down the name of their committee and the place where the committee is going to meet Most of the committees are going to meet in the Head quarters Room, which is just to the right as you come out of the door on the corridor, but they have only set up 13 tables there, and we have 20 committees, so that there will be seven committees meeting in this room We will let the chairmen of those committees know shortly which ones are going to meet in this room, and we would request you all to meet there this afternoon at two or three o'clock and work out our very important problems

Section 4

Reference of Reports and Supplementary Reports

SECRETARY ANDERTON I move that the Reports and Supplementary Reports of Officers, Council, Trustees, Legal Counsel, and District Branches that have been published and distributed to the members of the House be referred to the respective Reference Committees without reading

DR. WILLIAM KLEIN *Bronx* I second that motion

There being no discussion the motion was put to a vote and was carried

DR. THOMAS D ANGELO, *Queens* There are certain supplemental reports that have not been even published.

SPEAKER ANDRESEN Those we are going to take up next

DR. FREDRICK W WILLIAMS *Bronx* I voted nay on that last motion because last year we brought in a resolution asking you to have the reports of these officers and Council Committees in the hands of the delegates in ample time in advance of the House so that we could be informed as to how to vote on them. Today we are presented with some five different mimeographed reports on the chair and we don t even know anything about what is in them, yet you are going to ask us to vote on them I don't think that is fair

SPEAKER ANDRESEN We are asking the reference committees to study them and report tomorrow as to how they feel about them. In the meantime every member of the House will have a copy of them, and will be able to study them all afternoon and all night and then tomorrow when we hear the reference committees reports we will be able to act. In the meantime we would like people who are not informed to go to the meetings of the reference committees that are going to consider these supplementary reports and the various subjects and learn something about them before tomorrow morning so that they can vote intelligently upon them.

DR. WILLIAMS The reason I made my objection is that it has been called to my attention there is a suggestion in one of them for a special assessment on the members. You are asking your delegates to vote a special assessment on the members and we don t know how our county feels about a special assessment.

SPEAKER ANDRESEN What do you want to do call up your county this morning and get their authorization or instruction on how to vote on that?

DR. WILLIAMS It would have been much more fair if that report had gotten in early enough to be published so we could have come instructed on that as we suggested in the resolution last year Mr Speaker

SPEAKER ANDRESEN All right but here they are and we have got to thrash these things out this afternoon in the reference committees.

DR. WILLIAMS May I ask that it does not happen again next year?

SECRETARY ANDERTON Excuse me, sir The reason it happens is that the reports arrive at the office so very late If you will get the gentlemen that write the reports to send them in promptly and in plenty of time, we will have them ready for you in the JOURNAL. It is not the fault of the people that have had these mimeographed for distribution. They don t get them in until just the last minute

DR. WILLIAMS I am not questioning whose fault it is. I don t want to delay the meeting by discussing this further but I think someone ought to see that the reports are in on time so that they can be published.

Section 5 (*See 85*)

Annual Report of the Treasurer

To the House of Delegates—Gentlemen

The financial status of the Society is shown in the accompanying letter of transmittal and excerpts taken from the report of our auditors the firm of Patterson and Ridgway, certified public accountants, who examined the books of the Society for the fiscal year 1947

Last year, in the report of the Treasurer it was pointed out that we were operating in the red for the first time in many years The House of Delegates last year voted to increase the State assessment from $10 to $15 This was in May, 1947 but of course did not become operative until this year (January 1 1948)

During the remainder of 1947 expenses of operation continued to increase There were still a great many members of the Society carried on our books whose dues were remitted because of military service Another factor was the necessity of moving the offices and enlarging their size. This latter item entailed a great deal of additional expense and an increased personnel. Therefore, toward the close of the year we found our bank balances were at a perilously low figure and it became necessary for the Board of Trustees to authorize a loan in the amount of $50 000, so that we might continue to pay our current bills

During the course of the year our accounting system has been modernized and brought up to date in many respects. The work in the accounting department has increased because of payroll deductions for withholding tax social security old age pension, and also the proper accounting check system, office purchases sales-advertising and so forth.

The Finance Committee has set up a budget which shows an estimated surplus at the end of the ensuing fiscal year of $38 302. It is to be noted, however that we start the year with a deficit of approximately $50 000 chargeable against the proceding year and it is going to be only by the closest application of economy that we may end up this year in a favorable position

It is believed that, with increased membership the gradual cessation of remission of dues, and the increase in the assessment we will again be able to operate within our dues income However this supposition is predicated on a stable economy If rapidly rising costs should continue we may again find ourselves in the same position we were in last year when as an example the cost of publishing the *Directory* exceeded the previously estimated cost by over 60 per cent

In closing my report I should like to express my sincere thanks and appreciation to all members of the staff of the Medical Society of the State of New York for their helpfulness and cooperation during the past year I also wish to extend my deep personal gratitude to the Assistant Treasurer Dr Fenwick Beekman for his able and kind assistance on a number of occasions when it has been necessary for him to function

Respectfully submitted,

JAMES R. REULING M D *Treasurer*

March 11 1948

Auditors' Certificate

To the Board of Trustees Medical Society of the State of New York

We have examined the balance sheet of the Medical Society of the State of New York as of December 31 1947 and the statements of operating income financial income and capital for the year then ended have reviewed the system of internal

BALANCE SHEET—DECEMBER 31, 1947

ASSETS

GENERAL FUND		
CURRENT ASSETS		
Cash in banks and on hand		$ 91,371 51
Accounts Receivable	$10,871 97	
Less Reserve for Doubtful Accounts and for Commissions	948 35	9,923 62
Advances to Veterans Medical Service Plan of New York, Inc		16,496 87
Due from Endowment Fund		50 00
Dues Receivable—Net, estimated		4,740 00
Investments—		
At Cost (Market or Redemption Value $474,154 50) (see Notes A and B)		455,229 70
Accrued Interest Receivable		9,447 13
Inventory of Paper Stock		7,089 04
		$594,347 87
OTHER ASSETS		
Advance Costs		
1948 *Medical Directory*	$7,699 57	
1948 Annual Meeting	1,332 91	
Prepaid Expenses and Deposits	3,337 18	12,369 66
FURNITURE AND FIXTURES—At Nominal Value		2 00
ENDOWMENT FUNDS		
CASH IN BANK		12,313 39
TOTAL ASSETS		$619,032 92

LIABILITIES AND CAPITAL

GENERAL FUND		
CURRENT LIABILITIES		
Bank Loan (see Note A)	$50,000 00	
Accounts Payable	36,735 57	
Commissions Payable—JOURNAL and *Directory* Advertising Sales	7,347 77	
Taxes Payable	4,421 45	$ 98,504 79
DEFERRED INCOME		
Prepaid JOURNAL Advertising and Circulation	$ 1,685 22	
Annual Meeting—1948	14,482 50	
Prepaid 1948 Membership Dues	4,270 00	20,437 72
Reserve for Future Annual Meetings		10,000 00
CAPITAL—General Fund		477,777 02
ENDOWMENT FUNDS		
ACCOUNTS PAYABLE	50 00	
CAPITAL		
Lucien Howe Prize Fund	4,919 16	
Merritt H Cash Prize Fund	1,958 40	
A Walter Suter Lectureship Fund	5,385 83	12,313 39
TOTAL LIABILITIES AND CAPITAL		$619,032 92

NOTE A U S Treasury bonds in the amount of $101 000 (par) have been pledged as collateral on the bank loan.
NOTE B U S Treasury bonds in the amount of $60 000 have been earmarked for the JOURNAL Reserve and $10 000 for the Annual Meeting Reserve

presented to this body last year, and have been approved by this body last year, but inasmuch as no favorable action has been obtained on these resolutions the Comitia Minora of the Kings County Medical Society has instructed me to reintroduce these resolutions again

"WHEREAS, a bill to amend Section 1250 of the Education Law of the State of New York in relation to practice x ray diagnosis and treatment, and treatment by radium was introduced in the 1947 legislature, which bill was not passed, therefore be it

Resolved that the Medical Society of the State of New York request that a bill be introduced in the New York State Legislature in 1949 as follows

'X ray diagnosis means that method of medical practice in which demonstration and examination of the normal and abnormal structures, parts or function of the human body are made by use of x rays, and any person who holds himself out to diagnose or able to make or makes any interpretation or explanation by word of mouth writing or otherwise, of the meaning of a fluoroscopic or registered shadow or shadows of any part of the human body made by the use of x rays, and also the use of x rays or radium for the treatment of any human ailment shall be deemed to be engaged in the practice of medicine within the meaning of this article, and Section 1262 as follows The provision of this article shall be deemed to prohibit the practice of x ray diagnosis, x ray therapy, or radium therapy, as defined in subdivision 7A of Section 1250 of this chapter by any person other than a person licensed as a physician a dentist, an osteopath, or a podiatrist.'

Be it further

'*Resolved*, that the Medical Society of the State of New York actively work for the passage of this bill in the Legislature during the year of 1949'

SPEAKER ANDRESEN Referred to the Reference Committee on Report of the Council, Part IX, dealing with Legislation, of which Dr Andrew A Eggston is chairman

Section 37 (*See 115*)

Partnership and Group Practice

DR. AARON KOTTLER, *Kings* This resolution has also been approved by the Comitia Minora of the Kings County Medical Society and I have been instructed to present it to you at this time

WHEREAS, the New York State Legislature enacted Senate Introductory 740 Printing 2142 in the 1947 Legislature which is now a chapter of the laws of 1947 of the State of New York and

WHEREAS, said law amends the Education Law in relation to the practice of medicine by physicians as partners and permits the pooling of fees and monies for medical services by the members of the partnership or group and employes of such partnerships or groups and

WHEREAS, said bill does not specify or limit the number of partnerships or groups to which an individual physician may belong and

WHEREAS, under the present bill a physician might be a member of more than one group and use this as a subterfuge for the division of fees, and also create a situation where said member of more than one partnership might be tempted to render services for less than the agreed fee among the group, and

'WHEREAS, said bill permits a division of the fees with an employe who does not necessarily have to be a physician under the terms of the bill, therefore be it

Resolved that we request that legislation be introduced in the 1949 session of the New York State Legislature amending the recently enacted law concerning group practice or partnership and incorporating therein provisions or amendments to correct the foregoing objections.

SPEAKER ANDRESEN Also referred to the Reference Committee on Report of the Council, Part IX, dealing with Legislation of which Dr Andrew A. Eggston is chairman.

Section 38 (*See 108*)

Change in Constitution of American Medical Association in Regard to Acceptance for Membership of Doctors in County Medical Society Irrespective of Race, Color, or Creed

DR SAMUEL BENNETT BURK, *New York* This resolution is brought forth by direction of the Medical Society of the County of New York, and it relates to a change in the Constitution of the American Medical Association concerning acceptance for membership of doctors in county medical societies irrespective of race color or creed

WHEREAS, some county medical societies in various parts of the United States exclude from their membership physicians of certain races, regardless of their professional ability or ethical standing, and

WHEREAS, physicians so excluded from county societies are thereby excluded from membership or fellowship in the American Medical Association and

'WHEREAS, physicians excluded from membership in the American Medical Association are for that reason denied the right to apply for membership in other national professional societies where membership in the American Medical Association is a prerequisite, and

'WHEREAS, these physicians are thereby restrained in the legitimate pursuit and furtherance of their professional activities and

"WHEREAS, this exclusion of physicians on the basis of race constitutes an affront to our colleagues, a degradation of the honored traditions of our profession and a violation of our American democratic ideal therefore be it

Resolved that Article 4 of the Constitution of the American Medical Association be amended in the following manner The present Article shall be Section 1 of the new Article 4 and the following paragraph shall be added as Section 2 of Article 4

'No component society of the American Medical Association shall exclude any qualified physician from its membership by reason of race creed or color'

and further be it

Resolved, that this proposed amendment shall be introduced at the annual meeting of the House of Delegates of the American Medical Association to be held in 1948

SPEAKER ANDRESEN Referred to the Reference Committee on Miscellaneous Business B of which Dr William B Rawls is chairman.

DR. BURK It so happens that Dr Rawls is our President-Elect and will assume office as President

of the Medical Society of the County of New York soon I, therefore, wonder about the proposed resolution being submitted to his reference committee, but I bow to your judgment, sir

SPEAKER ANDRESEN I don't see why that should make any difference

DR FREDERICK WILLIAMS, *Bronx* After all he is only one member of the committee

SPEAKER ANDRESEN I think he would be particularly good for it

DR BURK The only question I had in mind was that he might be biased in our direction

SPEAKER ANDRESEN I don't believe so I will leave it where it is It has been referred to Reference Committee on Miscellaneous Business B

Section 39 (*See 145*)

United States Participation in the World Health Organization

DR REGINALD A HIGGONS, *Westchester* This resolution is offered by the Westchester County Medical Society

"WHEREAS, the World Health Organization was created under the auspices of the United States to meet medical and health problems on an international scale, and

"WHEREAS, with present day means of transportation, diseases or epidemics in one part of the world are a menace to all other parts, and

"WHEREAS, the bill to provide United States participation in the World Health Organization was passed by the Senate (S J Res 98) last July, and reported favorably by the House Foreign Affairs Committee (H J Res 161), and

"WHEREAS, on March 12, by a vote of 5 to 2, the House Rules Committee decided not to bring this bill before the House for action, and

"WHEREAS, this bill is still withheld by the House Rules Committee, and

"WHEREAS, prompt action must be taken if the United States is to participate in the first assembly of the World Health Organization to be held in Geneva during June, now therefore be it

"*Resolved*, that the House Rules Committee be petitioned by the Medical Society of the State of New York to present this bill for a vote by the House of Representatives in order that the leadership of American Medicine and Public Health may have its rightful voice in dealing with international health problems"

SPEAKER ANDRESEN Referred to the Reference Committee on Report of the Planning Committee for Medical Policies, of which Dr Thomas M D'Angelo is chairman

Section 40 (*See 73*)

Changing Chest Session to Section

DR A F GAFFNEY, *Oneida* The Medical Society of the County of Oneida at its regular meeting at Broadacres Sanatorium on Tuesday, April 13, 1948, instructed its delegates to present the following resolution to the House of Delegates of the Medical Society of the State of New York at its annual meeting in New York City in May, 1948

"WHEREAS, interest in chest diseases is great, as evidenced by large attendance at programs of the Session on Chest Diseases, and

"WHEREAS, great advances are currently being made in the diagnosis and treatment of chest diseases, and

"WHEREAS, more program time is required to present adequately these advances to the profession, therefore be it

"*Resolved*, that the Session on Chest Diseases be made a Section on Chest Diseases"

SPEAKER ANDRESEN This suggestion has already been made by one of the reports, the Report of the Secretary, therefore, this is referred to the Reference Committee on Reports of the Secretary, Censors, and District Branches, of which Dr Leo F Schiff is chairman

Section 41 (*See 114*)

Legislative Committee Activities

DR H J KNICKERBOCKER, Ontario This is not a resolution from Ontario County, it is presented personally

"WHEREAS, in addition to other expenses, bills for which did not pass through the office of the Executive Officer, Dr Robert R Hannon, it cost the State Society $734 32 in 1946, $771 96 in 1947, and $918 50 in 1948 to conduct the annual conference on County Legislative Chairmen, thus making the 1948 conference cost well over $1,000, and

"WHEREAS, the report of the Treasurer and Trustees indicates that unless we administer our available income on a more stringent basis there will again result a deficit, and

"WHEREAS, while these conferences are interesting, instructive, enjoyable and a definite social success, they do not accomplish the purposes for which they were designed due to the apathy and negligence of the County Legislative Committee, and

"WHEREAS, reports read at the 1948 conference prove this to be a fact, and

"WHEREAS, unless these County Legislative Committees wake up, take their assigned duties seriously, and wholeheartedly support the Legislative Committee of the State Society and the Executive Officer, Dr Robert R Hannon, their efforts in our behalf are bound to failure, and

"WHEREAS, this resolution is not to be considered as any reflection or criticism of the State Society's Legislative Committee or Executive Officer, Dr Robert R Hannon, and

"WHEREAS, it would seem to be within the province of some executive division of the Society to institute such changes as may be indicated to the end that the component county societies will become an active integral part of the legislative program, therefore be it

"*Resolved*, that this matter be referred to the Council for consideration and institution of such measures as will make our legislative program an outstanding success"

SPEAKER ANDRESEN Referred to the Reference Committee on Report of the Council, Part IX, Legislation, of which Dr Andrew A Eggston is chairman

Section 42 (*See 113*)

Amendment of Hospital Lien Law to Include Physicians' and Surgeons' Bills

DR DONALD MALVEN, *Dutchess* This is a resolution which has to do with the amendment of the hospital lien law to include physicians' and surgeons' bills, and which I have been instructed to present by the Dutchess County Medical Society, which I represent

"WHEREAS, it is well known that physicians and surgeons treating automobile accident cases

are unable, in many instances to collect the pay ment due them for their services because the patient goes to his home in some distant community as soon as he is able to be moved and settlement of his claim is often made without the physician being aware, so that the aforesaid physicians and surgeons lose considerable sums of money with no redress, and

"WHEREAS, the hospitals in which these cases are treated are protected by Section 189 of the Lien Law be it

'Resolved, that the 1949 session of the New York State Legislature be requested to amend Section 189 of the Lien Law to include the bills of physicians and surgeons for services rendered in the same cases as enumerated in said Section 189 of the Lien Law"

SPEAKER ANDRESEN That is referred to the Reference Committee on Report of the Council, Part IX, Legislation, of which Dr Andrew A. Eggston is chairman.

At this point Dr Edward P Flood, on behalf of the BRONX County Medical Society, introduced a resolution dealing with Action of Council on House of Delegates Directives, which was referred to the *Reference Committee on Report of the Council*, Part IX, but which subsequently on motion was ordered to be physically deleted from the record together with the discussion thereon

Section 43 (*See 119*)

Diversion of Federal Funds for Pediatric Undergraduate, Graduate, and Postgraduate Education

DR. WILLIAM J ORR, *Eighth District Branch*. I have been asked by the American Academy of Pediatrics to submit this resolution to the Medical Society of the State of New York for their consideration and support. It pertains to pediatric education and it is relative to a bill which is to be introduced in Congress by the Academy asking for a diversion of funds from Federal channels into a commission made up of nine pediatricians who are in private practice, which funds are to be used for the furtherance of pediatric education at an undergraduate graduate, and postgraduate level and also in hospitals

WHEREAS, the American Academy of Pediatrics has now concluded a complete two and one-half year survey of pediatric education in all of the approved medical schools and the pediatric departments of all hospitals and of all other child health services, including the care rendered by private physicians, state by state and county by county throughout the United States

'WHEREAS, this survey places the American Academy of Pediatrics in a unique position of knowing the facts related to the needs of child health services

WHEREAS, the Executive Board of the American Academy of Pediatrics has come to the conclusion that the first and most fruitful approach toward a national program for the improvement of child health must be predicated upon increasing and strengthening the teaching of pediatrics at the undergraduate, graduate, and postgraduate levels for general practitioners and pediatricians,

WHEREAS, a program for strengthening pediatric education will increase teaching budgets of medical schools and pediatric departments of hospitals, which even now do not have adequate financial support

WHEREAS, the Executive Board of the American Academy of Pediatrics, after due deliberation as to the availability of possible private sources of revenue has taken under consideration the use of Federal funds to assist these schools and hospitals in a program designed to further pediatric education,

'WHEREAS, to this proposal for Federal funds has been added the requisite that such funds be allotted according to the judgment of nine representative pediatricians and without interference with the policies or internal affairs of the institutions concerned,

'WHEREAS the Executive Board of the American Academy of Pediatrics proposes to submit to *the Congress a constructive program for child* welfare based upon the findings of its survey having thus gathered together the pertinent facts pertaining to child care and pediatric education, therefore be it

Resolved, that the House of Delegates of the Medical Society of the State of New York approve the recommendation of the Executive Board of the American Academy of Pediatrics that Federal grants, such as are now available in other fields of medicine, be provided for training in the medical care and health supervision of children

'*Resolved* further that this resolution be introduced at the meeting of the House of Delegates of the American Medical Association in June 1948"

SPEAKER ANDRESEN Referred to the Reference Committee on Report of the Council, Part II Maternal and Child Welfare of which Dr Thurman B Givan is chairman

Section 44 (*See 131*)

Publication of Articles on the Subject of Medicine

DR. STANLEY B FOLTS, *Seneca* This is a resolution from the Seneca County Medical Society

Be it Resolved by the Seneca County Medical Society, Inc., assembled that the resolution adopted by the House of Delegates of the New York State Medical Society at its 1947 convention which directs all members to seek official approval of the Society for the publication of any article on the subject of medicine written by a member of the Society for the lay press is hereby deemed a forthright violation of the basic principles of free speech and freedom of the press as guaranteed by the United States Constitution

Be it further resolved, that the Seneca County Medical Society Inc. authorize its delegate to petition the House of Delegates of the State Medical Society at the 1948 assembly to revoke the aforementioned resolution,

Be it further resolved, that the House of Delegates of the State Medical Society be further petitioned to expend its energy in the matter of censoring publications in the direction of those individuals who write pseudoscientific papers which are misleading or contrary to established scientific truths or whose articles are dedicated to the purpose of tearing down the traditions and the high standards of our profession

SPEAKER ANDRESEN Referred to the Reference Committee on Report of the Council Part XI Publication and Public Relations of which Dr Theodore J Curphey is chairman

Section 45 (*See 83*)

Enlargement of Council Committee on Workmen s Compensation

Dr Joseph C O'Gorman, *Erie* This first resolution pertains to the enlargement of the Council Committee on Workmen's Compensation of the Medical Society of the State of New York and geographic representation thereon We hope, if this resolution is passed, that the Workmen's Compensation Committee will consist of representatives chosen by each district branch As I say, that is our hope This is from the Medical Society of the County of Erie, but at the last meeting of the Eighth District Branch of Workmen's Compensation Committee chairmen, the principle of this resolution was recommended, and it was instructed that it be presented to the State Society

"Whereas, the Constitution of the Medical Society of the State of New York limits the membership of the Council Committee on Workmen's Compensation to three, and

"Whereas, there exists a definite need for enlargement of this Committee so as to give it wider geographic representation; now therefore be it

"*Resolved*, that the Constitution of the Medical Society of the State of New York be amended by inserting in Article IV, Section 10, thereof, after the sentence beginning with 'The membership of Committees' and ending with 'of the By-laws' the words 'and the Committee on Workmen's Compensation (k) Chapter IV, Section IV, Section 9 of the By-laws'"

There are some committees under the bylaws that may have more than three, so we offer this resolution as an amendment to the Constitution

Speaker Andresen Referred to the Reference Committee on Constitution and Bylaws, of which Dr Peter J Di Natale, of Genesee, is chairman

Section 46 (*See 160*)

Creation by the Medical Society of the State of New York of a Special Committee on the Problems of Alcoholism

Dr Joseph C O'Gorman, *Erie* Alcoholics Anonymous is quite a thing in Erie County, and the County Society has gone out wholeheartedly in back of it It was felt that it was work that was badly needed throughout the State

"Whereas, individuals manifesting the complex symptoms of alcoholism and compulsive drinking are sick persons in need of enlightened, sympathetic, and effective medical care, alcoholism being a disease to be dealt with as such, and

"Whereas, the broad question of the prevention and treatment of chronic alcoholism is a matter of immediate and deep concern to the medical profession of every community of the State of New York, the medical profession being conscious of its obligation to assist in reducing the incidence of chronic alcoholism, in providing adequate facilities for medical and institutional care and rehabilitation of these sufferers, and in re-establishing the chronic alcoholic, both socially and economically, and

"Whereas, there exists widespread demand among members of the medical profession of New York State that the Medical Society of the State of New York assume the leadership in developing within medicine's ranks a well-balanced program—preventive, therapeutic, and rehabilitative—and, furthermore, in stimulating increased interest in this vital problem by all component county societies, now, therefore, be it

"*Resolved*, that the Medical Society of the State of New York, represented in this duly convened annual meeting of its House of Delegates, hereby places itself on record as strongly favoring, approving, and requesting that there be established at the earliest possible date, through appointive action by the President of such State Society, a Special Committee on the Problems of Alcohol, such Special Committee to be representative geographically of all populous sections of the State, and be it further

"*Resolved*, that the Medical Society of the State of New York, through the agency of the proposed Special Committee on the Problems of Alcohol, or the Council of the State Society, urgently request each component county medical society in the State to appoint a local Special Committee on the Problems of Alcohol to function actively in association with its work in the field of public health"

Speaker Andresen Referred to the Reference Committee on Report of the Council, Part V, of which Dr Philip L Forster is chairman

Section 47

Announcement Re Meetings of Reference Committees

Speaker Andresen I would like to make an announcement about the ten committees that will meet in the Headquarters Room and the ten that will meet in Penn Top North on this floor

The following committees will meet in the Penn Top North, 18th Floor

President
Secretary, Censors, and District Branches
Treasurer and Trustees
Planning Committee for Medical Policies
Malpractice Insurance and Defense Board
Report of Legal Counsel
Constitution and Bylaws
Council—Part I
Postgraduate Education
Council—Part II
Maternal and Child Welfare
Council—Part III
Public Health Activities A
Council—Part IV
Public Health Activities B

The following will meet in the Headquarters Room on the 18th floor

Council—Part V
Public Health Activities C
Council—Part VI
Economics, Public Medical Care, Medical Service, Joint Committee of the Hospital Association and the Medical Society of the State of New York
Council—Part VII
Medical Care Insurance
Council—Part VIII
Liaison with Veterans Administration
War Memorial
Council—Part IX
Legislation
Council—Part X
Workmen's Compensation
Council—Part XI
Publication
Public Relations
Council—Part XII
Miscellaneous Conventions, Medical Licensure, Nursing, Woman's Auxiliary, Office

Administration and Policies, Ethics, Memorials
Miscellaneous Business A
Miscellaneous Business B

I would request the chairmen of the Reference Committees to write down as soon as possible the time when they are going to meet. Please put it on the blackboards that have been provided It is very important that everybody should know when and where the committees are going to meet.

Section 48 (*See 84*)

Advertising in the New York State Journal of Medicine

DR. GEORGE W KOSMAK, *Editor* Although not a member of this House, I would like the privilege of saying just a few words with reference to the supplementary reports which have been circulated by the Publication Committee

We hope that you will give your careful attention to the contents of these reports especially in view of the criticism which has been made by the President of the Society

We were stimulated to make the one supplementary report by the tirade which was contained in an editorial published in the *Journal of the American Medical Association* because we felt that this was a matter which could not go unanswered Therefore I would call your particular attention to the facts contained in our report.

I also want to say that the decision as to the admission of any pharmaceutic or other product in our advertising columns depends entirely on the medical members of the Publication Committee

I also want to call your attention to the Supplementary Report dealing with the finances for which the Publication Committee is responsible. We have endeavored to demonstrate to you why costs have increased to this remarkable degree, especially in the last two years.

Thank you!

Section 49 (*See 108*)

Amendment to Article 3, Constitution of the American Medical Association

DR. J LEWIS AMSTER *Bronx* Mr Speaker and members of the House, as a delegate from the Bronx County Medical Society I have been instructed to introduce the following resolution which deals with an amendment to Article 3 of the Constitution of the American Medical Association

WHEREAS, some county medical societies in various parts of the United States exclude from their membership physicians of certain races, regardless of their professional ability or ethical standing and

'WHEREAS, physicians so excluded from county societies are thereby excluded from membership or fellowship in the American Medical Association and

'WHEREAS physicians excluded from membership in the American Medical Association are for that reason denied the right to apply for membership in other national professional societies where membership in the American Medical Association is a prerequisite and

WHEREAS, these physicians are thereby restrained in the legitimate pursuit and furtherance of their professional activities and

WHEREAS, this exclusion of physicians on the basis of race constitutes an affront to our colleagues, a degradation of the honored tradition of our profession, and a violation of our American democratic ideals, therefore be it

'*Resolved*, that Article 3 of the Constitution of the American Medical Association be amended to read

No constituent association shall exclude from membership, any physician for other than professional or ethical reasons;'

and be it further

'*Resolved*, that the Delegates of the Medical Society of the County of Bronx are hereby instructed to introduce this proposed amendment at the annual meeting of the House of Delegates of the Medical Society of the State of New York, to be held in 1948, to the end that this proposed amendment shall be introduced at the annual meeting of the House of Delegates of the American Medical Association to be held in 1948 '

SPEAKER ANDRESEN Referred to the Reference Committee on Miscellaneous Business B, of which Dr William B Rawls is chairman

Section 50 (*See 100*)

Salary Scales for Public Health Physicians in the New York State Department of Health

DR HENRY E. MCGARVEY, *Westchester* This resolution is presented by the Medical Society of the County of Westchester and pertains to Salary Scales for Public Health Physicians in the New York State Department of Health

WHEREAS, the health and welfare of the State of New York are dependent in many ways upon the satisfactory operation and performance of services provided through the New York State Department of Health, and

'WHEREAS, upon investigation it is evident that these services are suffering from a lack of essential medical personnel and

'WHEREAS, the Commissioner of Health is handicapped in making replacements of highly important specialists because of inadequate salary scales and

WHEREAS, present available salaries for public health and laboratory physicians in the State Department of Health are not commensurate with incomes earned by physicians of like experience and training, and

WHEREAS, 48 out of 96 full time medical positions in the State Department of Health remain unfilled as a result of the low salary scales now in effect, and

'WHEREAS, important public health programs and necessary research cannot be carried on because of these conditions and

WHEREAS, these deficiencies threaten the health and welfare of the people of New York State now, therefore be it,

Resolved that the Medical Society of the State of New York respectfully petition the Governor of New York to take prompt action to rectify this situation by means of

1 Upward salary scale revision

2 The delegation of greater latitude to the Commissioner of Health to permit recruitment of personnel above salary scale minimums and

3 The simplification of Civil Service recruitment procedures as they pertain to medical personnel

SPEAKER ANDRESEN Referred to the Reference Committee on Report of the Council Part III of which Dr Harry Golembe is the chairman.

Section 51 (*See 161*)

Study of Alcoholism Problem by State Department of Health

DR ARTHUR F GLAESER, *Erie* I have been requested to present this resolution from the Medical Society of the County of Erie, which deals with a study of the alcoholism problem by the State Department of Health

"WHEREAS, alcoholism is an illness of individual and public concern, and

"WHEREAS, the estimated number of excessive drinkers in New York State is about 283,000 of whom 70,000 are chronic alcoholics, and the amount of suffering on the part of the patients and their dependents as a result of alcoholism is tremendous, and

"WHEREAS, the alcoholic is a sick person who often wants to be helped, but all of the causes of this illness are not known, and

"WHEREAS, medical facilities for the care and treatment of the alcoholic patient are woefully inadequate, and

"WHEREAS, the amount of money spent by government agencies in the ineffectual method of handling the alcoholic through prisons and penitentiaries, plus the amount spent for taking care of the dependents of these individuals, is considerable, now therefore be it

"*Resolved*, that the Governor and the Legislature of New York State be petitioned and urged to direct and authorize the State Department of Health, which is charged by the Public Health Law with safeguarding the health and life of the people of the State, to study the problem of the prevention and alleviation of alcoholism, and to devise methods and programs for the treatment and rehabilitation of chronic alcoholics, the Department to be provided with an adequate appropriation for this project, and, furthermore, that copies of this resolution be transmitted to the officials concerned for their favorable action"

SPEAKER ANDRESEN Referred to the Reference Committee on Report of the Council, Part V, of which Dr Philip L Forster is chairman

I fear that Erie County is going to get a bad reputation It is going to be known as the "alcoholic county" (*Laughter*) We have had two resolutions on that subject from that County Society today

Section 52 (*See 81*)

Specialty Boards

DR ANTHONY C GALLUCCIO, *Bronx* As a delegate from the Bronx County Medical Society I have been instructed to introduce the following resolution on Specialty Boards

"WHEREAS, it has always been the admitted aim of the American Medical Association to encourage hospital affiliations for all physicians, and

"WHEREAS, many hospitals are taking restrictive measures with respect to staff appointments and promotions in order to satisfy requirements established by Specialty Boards, and

"WHEREAS, these requirements of the numerous self-appointed and self-perpetuating Specialty Boards are often arbitrary, variable, and discriminatory, and

"WHEREAS, the accepted method of granting license to practice medicine and surgery is reserved to the various states, and the right to practice a specialty, being a logical extension of this method, should be State-controlled by standards set up through the various state societies and their components, and

"WHEREAS, it has been accepted as a first principle in the administration of American justice that a man be judged by a jury of his peers drawn from his local community, and

"WHEREAS, the Council on Medical Education and Hospitals of the American Medical Association with the concurrence of the Advisory Board for Medical Specialties has stated that,

'Hospital staff appointments should depend on the qualifications of physicians to render proper care to hospitalized patients as judged by the professional staff of the hospital and not on certification or special society membership',

and

"WHEREAS, this entire problem presents a challenge to the ability of the American Medical Association to regulate itself with justice to all members and to advance the cause of Public Health and Welfare through the improvement of medical standards, therefore be it

"*Resolved*, that the Bronx County Medical Society through its Delegates request the Medical Society of the State of New York to take measures to arrest and correct this inequitable situation until such time as means may be found to place certification of specialists on a more reasonable, democratic, and local basis, and be it further

"*Resolved*, that, failing to obtain cooperation from the various Specialty Boards and hospitals, the American Medical Association be requested to withhold recognition from hospitals which make certification by a Specialty Board a necessary qualification for appointment or promotion on a hospital staff, and be it further

"*Resolved*, that the Delegates of the New York State Medical Society to the American Medical Association be instructed to place these resolutions before the 1948 House of Delegates of the American Medical Association"

SPEAKER ANDRESEN Referred to the Reference Committee on Report of the Council, Part XII, of which Dr Joseph A Geis is chairman

Section 53 (*See 112*)

Podiatry Legislation

DR SAMUEL GITLOW, *Bronx* This is a resolution on Podiatry Legislation that was passed at the last session of the House of Delegates, and which incurred the two resolutions from Richmond and Bronx about the action which the Council took This is presented at the behest of the Bronx County Medical Society

"WHEREAS, Podiatry is a technical minor adjunct of orthopedics, and

"WHEREAS, many major systemic diseases have manifestations in lesions of the lower extremity, and

"WHEREAS, the Institute of Podiatry is not a medical school, and

"WHEREAS, the licensed podiatrists have been active in attempting to pass legislation in this State to extend the limitations of their licensure to include treatment of systemic disease, and

"WHEREAS, the treatment of disease constitutes the practice of medicine under the laws of this State, and

"WHEREAS, the passage of such legislation

would be detrimental and hazardous to the public health and welfare, therefore be it

'*Resolved* that the Medical Society of the State of New York put itself on record as being opposed to such legislation, and be it further

'*Resolved* that the Governor and members of both Senate and Assembly be sent copies of this resolution, and be it further

Resolved, that the Legislative Committee and our Albany representative be instructed to govern themselves accordingly and be it further

"*Resolved*, that the content of these resolutions be made known to the Board of Regents of the State of New York."

Section 54 (*See 95*)

Workmen's Compensation—Fee Schedule

DR. RAYMOND F KIRCHER *Albany* As a delegate from the Medical Society of the County of Albany I have been instructed to introduce the following resolution

'In view of the long delay in satisfactory revision of the Workmen s Compensation Fee Schedule of the State of New York which has not been materially altered since its establishment, and in view of the greatly increased costs of the practice of medicine during the recent years,

Be it resolved that the Delegates from the Medical Society of the County of Albany be hereby instructed to present to the annual meeting of the House of Delegates of the Medical Society of the State of New York to be held in May, 1948, this, our protest, against the long delayed action of the Workmen's Compensation Board and the State Medical Society, and which delay has resulted in an unfair financial loss by the physicians of New York State.'

SPEAKER ANDRESEN Referred to the Reference Committee on the Report of the Council, Part X of which Dr Frederic W Holcomb is the chairman and which is dealing with Workmen's Compensation matters

Are there any other resolutions to be introduced?

Section 55 (*See 18 119*)

Change of Reference of Supplementary Report of Council, Part VI, Dealing with Economics

SPEAKER ANDRESEN We have the supplementary report of the Council Part VI, which defines the practice of medicine, and which is the resolution which the x ray men the physiotherapists the pathologists and the anesthesiologists want. That is being referred to the Reference Committee on the Report of the Council Part IX, dealing with Legislation That will embrace what several of the motions today have brought up

Section 56

Announcements

SPEAKER ANDRESEN I also want to announce a meeting of the Board of Directors of the Veterans Medical Service Plan at two o clock this afternoon

Further that you can get tickets to a radio program free for tonight, to see the Chesterfield Show or the Family Quiz or Books on Trial, or Patterns in Melody You may get them at the desk outside

While you are at the desk it will also be a good idea to buy your tickets for the banquet Wednesday night, I have been asked to emphasize that fact

I have also been requested to emphasise what I mentioned before that interviews with physicians and the press should take place in the press room There you can get advice on how to present things properly to the public press.

Are there any further resolutions?

Section 57 (*See 94*)

Workmen's Compensation—To Amend the Law to Abolish the Medical Practice Committee

DR. THOMAS M D ANGELO *Queens* May we introduce any resolutions in the House tomorrow morning?

SPEAKER ANDRESEN We would prefer as many as can to bring them in today so that the resolutions can be referred to the proper reference committees for study and report tomorrow

DR. D ANGELO Queens County has a resolution it would like to present, but it is not here now It is a change in the Workmen s Compensation Law to go back to what it was in connection with the duties of the County Compensation Boards I present it by title only now, but I will give it to the Reference Committee

SPEAKER ANDRESEN You will have it ready for the meeting of the Reference Committee on Report of the Council, Part X, dealing with workmen's compensation matters, this afternoon?

DR. D'ANGELO Yes

SPEAKER ANDRESEN Very well, that will be so referred then to the Reference Committee of which Dr Holcomb is chairman, Report of the Council, Part X

The resolution referred to above is as follows

"WHEREAS, compensation practice in the counties of New York Brooklyn, Bronx, and Queens (of over one million population) under the control of the Medical Practice Committee is discriminatory and not conducive to good administration of the Workmen s Compensation Law, therefore be it

Resolved that the New York State Medical Society urges the Legislature of the State of New York to amend the Workmen s Compensation Law to abolish the Medical Practice Committee, and be it further

Resolved that the support of the county medical societies outside the metropolitan area is urged in order to re-establish a uniform administration of the law throughout New York State '

Section 58 (*See 154*)

Premarital Blood Tests

DR. G S PHILBRICK, *Niagara* This is introduced at the direction of the Niagara County Medical Society

WHEREAS under the present public health law thirty days are allowed in which applicants may apply for a license for marriage and

'WHEREAS, after receiving a license for marriage sixty days are allowed for the applicant to exercise his right to use such license and

'WHEREAS, this gives the applicant ninety days in which he or she may become infected which in effect partially nullifies the benefits of this law, therefore be it

Resolved, that this House of Delegates go on record as being in favor of a shorter period of time between examination and consummation of the marriage and the matter be referred to the Council for appropriate action.

SPEAKER ANDRESEN Referred to the Reference

Committee on Report of the Council, Part IV, Public Health Activities (B), of which Dr Thomas H McGavack is the chairman

Are there any further resolutions?

There was no response

SPEAKER ANDRESEN Any further announcements, Mr Secretary?

SECRETARY ANDERTON I can think of none

SPEAKER ANDRESEN I would like to call your attention to the fact that tomorrow morning we start at nine o'clock We have a full day's work to perform, so we will start promptly at nine o'clock

The meeting is now adjourned until nine o'clock tomorrow morning We hope you will attend the Reference Committee meetings this afternoon

The session adjourned at 12 30 P M

Morning Session

Tuesday, May 18, 1948

The session convened at 9 10 A M

SPEAKER ANDRESEN The House will please come to order

I have a couple of announcements to make, and I will do that right away and get them off my chest First, I want to remind you again to buy your tickets for the Annual Dinner out at the desk

Second, I have an invitation from the United Medical Service to show you how the plan works If you make application for transportation at Booth D on the Mezzanine Floor they will be glad to transport you to their headquarters at Lexington Avenue, where you can see how the Associated Hospital Service and the United Medical Service work

I want to call your attention again to the importance of visiting the Technical Exhibits in order to encourage the people who support us by paying for their exhibits

This morning we want first to get in all of the resolutions that have not so far been presented Remember that after today no other resolutions can be introduced I take it that Erie County has another one on alcoholism (*Laughter*)

Section 59 (*See 21*)

Introduction of Representative from Pennsylvania State Medical Society

SPEAKER ANDRESEN We have with us this morning one of the delegates from our neighboring states who did not come yesterday, Dr Gilson Colby Engel, who is President-Elect of the Pennsylvania State Medical Society He will be escorted to the platform by Dr Aranow

The delegates arose and applauded as Dr Harry Aranow, of Bronx, escorted Dr Gilson Colby Engel to the platform

SPEAKER ANDRESEN Dr Engel is professor of clinical surgery of the Graduate School of Medicine, University of Pennsylvania, President-Elect of the Medical Society of the State of Pennsylvania, Chief of Surgical Service "B," Lankenau Hospital, Philadelphia, and director of the Postgraduate Institute of the Philadelphia County Medical Society

DR GILSON COLBY ENGEL Mr Speaker and members of the House of Delegates, I am deeply grateful for the invitation to be here I also appreciate the amount of work you men have ahead of you today, and I assure you I will not abuse the privilege of getting up and saying a few words

I would like to bring you greetings from the Medical Society of the State of Pennsylvania, and to assure you we watch your every move to see that we can try to keep up to New York, and maybe sometimes go ahead of it, but we have not been able to do that yet

I would like to invite you all to Philadelphia in October It is our Centennial Celebration This must sound like a very weak plea to you men who are meeting here on your 142nd celebration, nevertheless, in Pennsylvania it means a great deal to us We are building up a tremendous program for it, starting October 3, and we invite you all to come over and visit us during that time

There are a lot of remarks I would like to make this morning, but instead perhaps I could say a few words about disaster preparedness I could spend a lot of time on medical service, national compulsory health insurance, and many other problems with which we are confronted, but I defer in all of those to put one point across this morning in which I hope we have New York State's cooperation Your President, Dr Bauer, yesterday, I believe, talked to you about the importance of disaster preparedness It has been duly impressed upon us the importance of such a function in medical organizations, not that we anticipate immediately, and we hope never in the future, an atomic attack, but, nevertheless, we must be prepared for such Doctors in the past have fallen into line with lay organizations and have taken dictation from lay organizations We believe it is about time that the medical profession takes the lead in these problems, and then fits their program into those of lay organizations I think we must stand on our feet and show the public that we are leaders in medical affairs

We have planned in Philadelphia and in the Pennsylvania Medical Society a setup whereby we have a preparedness disaster committee It is on a state level and district councilor level We would like to set it up on a regional level, and I have cleared this morning with Dr Lull and Dr Bauer, so I feel we have clearance with the American Medical Association, and we have clearance with Washington, who are amazed at what has been done up to this point

I would appreciate it very much if this House of Delegates would give your President the authority to appoint a man as chairman of the State Committee on Preparedness Defense We are planning to have a regional conference soon to take in New York, New Jersey, Pennsylvania, Delaware, Maryland, District of Columbia, and Virginia, at which time the fundamental principles involved would be discussed and definite plans would be made as to the personnel of the committee

Our committee is set up down there on a basis whereby we have subcommittees under the first committee The first one is on Monitorization, which is composed of roentgenologists who would break down instruction to the ward level of a municipality, so that the first plan would be monitorizing the whole area to see which part of it is radioactive The second is a Subcommittee on Blood, Blood Substitutes, and Therapy You can well understand the possibilities of that committee The third, and a very important committee, is one on Morale because the government at this time is quite frightened of panic occurring even at the thought of an atomic disaster Emergency Administration is an-

other subcommittee in which will be set up rural emergency hospitals Then the Committee on Epidemiology composed of public health officers for water supplies sewage disposal and the like The last is Public Education and Public Relations That is a tentative plan

I would like it if you men here would as I said before authorize your President to appoint a man as chairman of a State Committee so that we could call on that man to attend a Regional Conference Committee meeting within the next couple of weeks to set this program up on a regional basis

Again may I thank you for the privilege of appearing here before you this morning and I do hope that I have not taken too much time out of your business schedule

Thank you very much! (*Applause*)

Section 60

Introduction of Secretary and General Manager of American Medical Association

SPEAKER ANDRESEN We are honored today in having with us the Secretary and General Manager of the American Medical Association Dr George Lull Dr Bauer our President, will bring Dr Lull to the rostrum

The delegates arose and applauded as Dr Louis H Bauer escorted Dr George Lull to the rostrum

DR. GEORGE LULL Mr Speaker and members of the House of Delegates I bring you greetings from the headquarters of your national organization

I was very much interested in the remarks of Dr Engel I believe that we are going forward in assuming a certain amount of leadership, although we must not lose this opportunity to take hold of this matter of emergency medical service Things are moving quite rapidly in Washington, and unless the people in the various states keep their eyes open they will get ahead of us.

The situation in your national headquarters is quite interesting We employ now more people than we have ever employed in the history of the organization less 90 men who claim they were locked out and are picketing the building and have signs on saying that the doctors' union has locked out the printers' union

You will notice that your *Journal* has been coming through printed so that I hope you can read it. We are not any too proud of the job that is being done the job of printing I mean but we are proud of the fact that we have gotten your *Journal* to you almost on time, and that the material in it can be read even if with difficulty This material now is put up almost entirely by the Barratype process We had some of the printing done in Minneapolis but our union prevailed upon the union who is employed in Minneapolis to refuse the work so although that is probably illegal and the firm could be sued we did not want to be mixed up in a law suit at this time, and it was passed over, however we are getting the *Journal* out.

We are also prepared to house we hope, more doctors than have ever before come to a national meetings in Chicago We believe that we will have not quite so many as came to the Centenary in Atlantic City but we will have more than ever before in Chicago The hotel bureau which handles the registration tells me that the first-class hotels are practically full at this time, and many of the hotels that are not quite first class They still have some rooms available that have not been turned over to them in good hotels.

I don t want to take up the valuable time of this body with remarks which are only of a moderate degree of interest while you have important work to do

Thank you Mr Speaker! (*Applause*)

SPEAKER ANDRESEN Thank you Dr Lull!

Section 61 (*See 105*)

Report of Subcommittee on Cults of the Council Committee on Legislation

The following report was distributed to each one of the delegates

To the House of Delegates—Gentlemen

The Subcommittee on Cults of the Council Committee on Legislation has the following membership

Maurice J Dattelbaum, M D *Chairman* Brooklyn
Charles Gullo, M D , Mt. Morris
Reginald A Higgons, M D Port Chester
O W H Mitchell, M D , Syracuse
Leo F Simpson, M D , Rochester

The Subcommittee was appointed by the President pursuant to a motion unanimously adopted by the House of Delegates on May 7, 1947 authorizing him to appoint a subcommittee of the Council and two members of the House of Delegates to study the methods to be applied for the control of cults and to report its recommendations to the House at the next annual meeting

Meetings of the Subcommittee were held on July 17 and November 12, 1947 and on February 11 and April 7 1948 Present at these meetings, in addition to members of the Subcommittee, were officers and representatives of the Medical Society of the State of New York These included, at one or more of the meetings Dr Louis H Bauer president, Dr W P Anderton, secretary Dr Robert R. Hannon, executive officer, Dr Harry Aranow, chairman of the Legislative Committee, Dr Floyd S Winslow chairman of the Committee on Public Relations, Dr Laurance D Redway literary editor of the NEW YORK STATE JOURNAL OF MEDICINE, Mr William F Martin and Mr Thomas H Clearwater, counsels and Messrs Dwight Anderson, Thomas E. Walsh and Frederick W Misbach of the Public Relations Bureau Also in attendance were Dr Jacob L. Lochner Jr secretary of the Board of Medical Examiners of the New York State Department of Education Mr J W Holloway of the Bureau of Legal Medicine and Legislation of the American Medical Association, Mr Sidney Tartikoff, Assistant Attorney General of the State of New York and Mr Irwin A Conroe Assistant Commissioner of the New York State Department of Education each attended one meeting

Part I —In opening its work, the Subcommittee turned first to the subject of chiropractic and came to the conclusion that a thorough, open-minded study of chiropractic was necessary in order to prove or disprove its value Such a study it was decided could provide a basis for a recommendation by the Subcommittee for legislative action regarding chiropractic and would further serve as a means of evaluating the claims of chiropractors that their methods are scientific

It was pointed out that pressure is constantly being put on legislators to license chiropractors. The legislators ordinarily have nothing to guide them in determining the validity of the claims made by the chiropractors that their practice is scientific. ' The public at large has a tendency to accept chiropractic as propagandized, and when chiropractors are brought to trial juries are reluctant to convict.

An impartial study of the situation was held to be necessary in all fairness to the public

It was decided to name a commission of three members, selected for their scientific standing, to examine carefully the methods used by chiropractors, to weigh the scientific value of their basic tenets, and to submit a report to the Subcommittee on their findings

The Commission subsequently appointed through the assistance of Dr Mitchell consisted of Dr Philip B Armstrong, Professor of Anatomy, Syracuse University College of Medicine, Dr Homer D Keston, Pathologist, White Plains Hospital, White Plains, and LeRoy Barnes, Professor of Biophysics, Cornell University

Members of the Commission were introduced to the members of the Subcommittee at the meeting of November 12, and they were asked by the chairman to approach the problem with open minds

The Subcommittee also discussed the merits of the Basic Science Laws in effect in a number of states, and the degree of success that these laws are achieving in limiting the operations of cults It was stated that New York State has become a "dumping ground" for cultists from other states and that steps are necessary to strengthen the Medical Practice Act Dr Gullo was delegated to obtain information regarding the effect of the Basic Science Laws in other states It was agreed that the work of the Subcommittee should be confidential until a final report is submitted

A final report of the Commission was submitted to the Subcommittee on April 7, 1948 This report stated unequivocally that the fundamental tenets of chiropractic are not scientifically valid and could be of no conceivable value in the development of medical science and teaching

After the report of the Commission was read, it was unanimously approved by the Subcommittee, with the recommendation that the House of Delegates direct the Committee on Public Relations to disseminate it to legislators, members of the judiciary, and to the general public It was suggested that illustrations be added to the Commission's report in order to make the text popularly understandable

The full text of the Commission's report is attached

Part II —The subcommittee devoted considerable attention to an examination of the enforcement of the present Medical Practice Act Mr Tartikoff, Assistant Attorney General in charge of Education, and Mr Conroe, Assistant Commissioner for Professional Education of the State Department of Education, attended the meeting of April 7

Mr Tartikoff summarized his experiences in attempting to obtain convictions of chiropractors for violating the Medical Practice Act He declared that not only the general public, but members of the judiciary as well, appear to be unaware that chiropractic has no scientific foundation, and that the practice of chiropractic, under the New York law, is in fact the practice of medicine After hearing the report of the Commission, he and Mr Conroe recommended that enforcement of the law be strengthened Mr Tartikoff gave the Subcommittee considerable information regarding the means that could be employed to achieve this end Mr Conroe outlined the views of the Department of Education on the subject and said that it was necessary for other agencies to be instrumental in obtaining adequate enforcement

After considering all phases of the matter, the Subcommittee unanimously voted to recommend to the House of Delegates that the Legislative Committee be empowered to draw up and have introduced legislation to implement the enforcement of the present Medical Practice Act by the use of the injunctive procedure against cult practitioners It was suggested that the Legislative Committee consult the legal staff to consider the availability of any other efficacious measures in addition to the injunctive procedure

Part III —During the year, Dr Gullo submitted to the chairman material he gathered in his study of the operation of the Basic Science Laws in other states Much of this material consisted of letters from Basic Science Boards giving information regarding the extent to which the Basic Science Laws have been successful in eliminating cult practice

Dr Gullo submitted to the chairman a summary stating that the Basic Science Law now prevails in 17 states, the District of Columbia, and Alaska. He asserted that the law has justified its existence by the record, which indicates that it has obtained its objective, evidenced by the number of cultists in those states that have the law and by virtually completely preventing further licensure of cultists The record indicates, according to the summary, that in those states that have the law only 125 chiropractors have been licensed since 1925

The Subcommittee also studied an analysis prepared by Dr Walter L Bierring, secretary of the Federation of State Medical Boards of the United States This analysis, after pointing out the lack of uniformity among the 19 existing Basic Science Laws, indicated that the number of chiropractors appearing before Basic Science Boards is decreasing each year It showed further that, in order to control the small proportion of unqualified applicants, all graduates of approved medical schools and many with additional postgraduate training are required to submit to an extra test of knowledge in the fundamental medical sciences by examiners not always familiar with the modern methods of teaching such sciences All of the Basic Science Boards except those of Florida, Michigan, South Dakota, and Washington have the discretionary power to issue a certificate in the basic sciences, without examination therein, to those who present satisfactory evidence of having passed an examination in the basic sciences before a board authorized to issue licenses to practice the healing art of any state, territory, or jurisdiction under the United States

The Subcommittee, after intensive study of the Basic Science Laws in other states, believes there is some merit in the principles involved but recommends that the House of Delegates not approve a Basic Science Law in this State at this time, as our Medical Practice Act performs the same functions

The use of this injunctive procedure, as recommended in Part II of this report, is recommended to control cult practice in New York State.

Respectfully submitted,
MAURICE J DATTELBAUM, M D, *Chairman*
CHARLES GULLO, M D
REGINALD A HIGGONS, M D
O W H MITCHELL, M D
LEO F SIMPSON, M D

Report of the Commission on the Study of Chiropractic to the Subcommittee on Cults —The fundamental tenet of chiropractic claims that all disease is due primarily to pressure on nerves It should be emphasized at the very outset that nerve pressure as the primary cause of disease is only a belief The

chiropractors have not demonstrated its truth by scientific experimentation They have assumed that it is true and, on this assumption, have instituted methods of treatment. There is, however, a large body of scientific fact which conclusively disproves the fundamental tenet of chiropractic.

What does happen when a nerve is subjected to pressure? A nerve is made up of many microscopic fibers some carrying impulses out to muscles or other tissues, others carrying impulses into the central nervous system Pressure on these nerves of sufficient intensity can reduce or abolish their activity If the compressed nerve fibers are running out to the leg muscles these muscles will not contract and, if the condition persists, the muscles will 'wither This is seen as a result of the destruction of nerve cells in infantile paralysis. Or if the nerves are going into the central nervous system from the skin, for example, and are compressed then there will frequently be pain in the area from which the nerves come since the pressure at first irritates the nerves Eventually all sensation from the area will be lost as the pressure produces degeneration of the nerves Nerve fibers have specific functions and these functions are lost with continued pressure on the nerve The area of skin deprived of its nerves does not show increased susceptibility to cancer There are no nerve fibers for kidney disease tuberculosis or diphtheria. The stomach and the heart receive the same kinds of nerve fibers, one type decreasing, the other increasing, the functioning of these organs But even though these organs receive the same types of nerves, the diseases seen in these two organs can be very different and can appear with a normal innervation Pressure on nerves does interfere with nerve function with the specific functions of the compressed nerves.

In a current textbook on chiropractic the authors (Joseph Janse, R H Houser and B F Wells, *"Chiropractic Principles and Technic*, Chicago 1947) maintain "Probably in all abnormal states there is a demonstrable spinal lesion In line with their basic tenet chiropractors have devised methods of manipulation intended to relieve pressure on nerves. Much of their treatment is applied to the vertebral column. The spinal nerves issue from the spinal cord out through openings between adjacent vertebrae These openings are maintained at normal size by resilient pads or disks which keep the adjacent vertebrae apart. If adjacent vertebrae become displaced (subluxated) the opening between the two vertebrae frequently becomes narrowed and pressure on the nerve results with weakness of the muscles supplied by the nerve and pain in its area of distribution, and other effects dependent on the specific functions of the nerve fibers. The chiropractor attempts to reduce the subluxation by manipulation. Permanent reduction of a subluxation by chiropractic manipulation is frequently impossible as many subluxations result from degeneration of the disks between vertebrae which normally maintain the nerve openings No amount of manipulation will restore the degenerated disks.

There is an even greater barrier to the successful application of the chiropractic methods of treatment than that described above Many very important nerves leave the central nervous system through bony openings which are entirely rigid, formed of a solid ring of bone This is true of all the nerves coming from the brain and also the lower spinal nerves. Those from the brain are distributed to all the structures in the face and one of them passes down through the neck and thorax into the abdomen, supplying the heart, lungs stomach, liver, intestines, and other important structures. The lower spinal nerves pass out through the sacrum to the prostate bladder uterus, etc These structures are frequently involved in disease which, according to the chiropractors, is due to pressure on their nerves No amount of manipulation can change the rigid openings through which these nerves pass from the skull or sacrum.

It is impossible to explain disease in some tissues as due to pressure on nerves particularly in those tissues which receive no nerves The blood is subject to a variety of diseases but receives no nerves not even in the bones where most of the blood cells are formed Malaria is a protozoan blood disease transmitted to man by mosquitoes. The organisms can be seen in the red blood cells which circulate throughout the body Where do the chiropractors manipulate to relieve a disease existing throughout the body in the blood a tissue which receives no nerves? Pernicious anemia poses the same problem

Some of the glands of internal secretion which are so important in regulating various activities of the body are not under the control of the spinal nerves. An outstanding example is the pituitary gland the so-called 'Master Gland of the body which is found inside the skull below the brain. The posterior part of this gland is controlled by direct connections from the brain above If these connections are severed, a form of diabetes results Obviously, vertebral subluxations and spinal nerve pressure cannot be concerned in such a condition

Chiropractors claim that if nerve function is interrupted disease commonly results They have not realized that the reverse may be true, that a disease condition may be relieved by interrupting nerves, actually by severing nerves The great neurologic surgeon Dr Harvey Cushing, perfected an operation for cutting one of the nerves entering the brain which gives complete relief from tic douloureaux an extremely painful neuralgia of the face A number of nerve-cutting operations have been devised for the relief of a variety of conditions. When the neurosurgeon severs nerves he knows what the results will be because the nerves have specific functions. Here we see that some disease conditions are relieved by abolishing nerve function which is diametrically opposed to fundamental chiropractic belief

We used to talk about the 'germ theory' of disease. It is now definitely established that a number of diseases are produced by infective organisms. This has been established by painstaking and controlled experimentation repeated again and again. The application of this knowledge in proper sanitation and public health measures has almost completely eliminated some diseases Typhoid killed more men in the Spanish-American War than died in battle In the two great World Wars, it was a rarity being controlled by proper sanitation and immunization. Now, when a case of typhoid appears it can frequently be traced to a carrier The death rate in pneumonia has been cut sharply by the use of penicillin. Penicillin will inhibit the growth of pneumococci in a culture outside the body and is also effective in the treatment of the disease Diphtheria toxin injected into guinea pigs in determined amounts will invariably cause death. Are we to assume that all the guinea pigs have vertebral subluxations? If the diphtheria toxin is preceded by a protecting dose of antitoxin then the guinea pigs do not die. Are we to assume that the antitoxin reduced all the vertebral subluxations? If there is an epi-

demic of infantile paralysis in Buffalo one year but not in Albany, are we to assume that in that year the children of Buffalo suffered a larger number of subluxations than those in Albany? And yet Carver had the temerity to state in his *Chiropractic Analysis*, "The therapeutic theory of germs as a causation of disease is about fifty to fifty-five years old There is nothing in the whole experience of the human family to sustain it" Chiropractors are having to recede from this view since it is incontrovertible that bacteria are the primary cause of many diseases

We would not take our car with engine trouble to a mechanic who believed that all car trouble results from lack of alignment of the front wheels And yet we are doing a comparable thing when we allow the chiropractor, with his erroneous concepts of disease based on false tenets, to manipulate the body All too frequently the end result is tragedy The public should be protected from the errors of such misguided incompetents

Section 62 (*See 139*)

Veterans Administration

DR HERBERT H BAUCKUS, *Past-President* Mr Speaker and members of the House, I have here seven resolutions to present They are resolutions adopted by your Liaison Committee with the Veterans Administration These resolutions were seen and discussed yesterday by the Board of Directors of the Veterans Medical Service Plan, Inc , and they also have approved of these resolutions I do not intend to discuss nor to give a report on the subject at this time I hope that later in the day I may be permitted to report to you on the home town medical care program

I might say that within the last ten days I had the privilege of meeting with Dr Magnuson, the Medical Director, in Washington, and also with representatives of the American Hospital Association

These are the resolutions

"1 That the Medical Society of the State of New York reaffirm its endorsement of a program that will give the veteran the very best medical and hospital care attainable

"2 That any new contract entered into by the Veterans Medical Service Plan, Inc , shall provide for the free choice of physician for the veteran Exceptions to this rule to be made only by mutual agreement by an appropriate committee of the two parties

"3 That the fee schedule be a State-wide schedule approved by both parties and subject to change in specific instances by mutual agreement

"4 That the State Medical Society disapproves of part-time employment of its members in any capacity which shall forbid the private physician from practicing medicine outside of assigned hours, including the care of veterans on a fee basis

"5 There are or have been regulations which deny to former part-time or full-time physicians, resigning from the Veterans Administration, the privilege of caring for veterans on a fee basis for a period of two years following the physician's resignation, excepting only the physicians removing to a distant locality"

I might say that was supposed to be about 150 miles away

"We condemn such interference as un-American in its abrogation of individual rights, a negation of the free choice principle, and a dictatorial, bureaucratic device which limits and obstructs medical service to veterans, at the same time serving as a penalty to physicians, in many cases veterans themselves

"6 That we support the American Hospital Association in its stand against the building of veterans hospitals beyond the present day requirement, that we favor free choice of hospital by the veteran in the service-connected case whether the selection be a veterans, community, or a private hospital, that the expansion under the Hill-Burton plans would provide additional hospital facilities enabling the veterans to choose and have care in their own localities, that as far as can be ascertained at present, if the proposed plan for construction of 92 additional veterans hospitals is carried through, the bed capacity of these hospitals, together with those already existing under the Veterans Administration, will be over twice the calculated bed needs for the next fifteen years

"7 That we recommend the formation of a special committee composed of representatives of the veteran organizations, Veterans Administration, and a special committee of the Medical Society of the State of New York for discussion and consideration of veteran hospital and medical care"

SPEAKER ANDRESEN Referred to the Reference Committee on Report of the Council, Part VIII, of which Dr Joseph P Henry is chairman, and it will be taken up this afternoon in executive session

Section 63 (*See 163*)

Supplementary Report of Council Committee—Part VI

SPEAKER ANDRESEN I now recognize Dr Wertz, who has a report to make for the Economics Committee

DR CARLETON E WERTZ, *Councilor* Your Economics Committee would like to call to your attention a number of factors, some new and some old, which have a great influence on the practice of medicine and on the economics of medicine Many of these factors are countenanced knowingly or otherwise by the profession

Many of us are, perhaps, too busy to appreciate the effects they are apt to have if the profession does not become alert, united, and take a positive stand on the many principles which are now being overlooked, or at the most a mild statement is made and then the entire matter is left in a status quo position

1 The controversy over the four specialities of pathology, anesthesia, physiotherapy, and roentgenology still goes on The American Medical Association and the Medical Society of the State of New York both state that these specialties are included in the practice of medicine, yet many of us are, apparently, willing to allow the hospitals to absorb these definite branches of medicine Physicians in several areas in the State, although voluntary medical plans exist in those same areas, allow the Blue Cross to provide for these specialties

Hospitals, mainly teaching hospitals, have been placing full-time men at the head of departments of otherspecialties such as surgery, medicine, obstetrics, and pediatrics This can, possibly, only mean that the hospitals will take over more and more of the practice of medicine

2 There is a growing development of lay organizations interested in a great many subjects Just to mention a few the National Foundation of Infantile Paralysis, American Cancer Society, National Tuberculosis Association, American Heart Association, American Diabetic Association, Associa-

tion for Spastic Paraplegia, Rheumatic Fever, and many others

Most are educational and diagnostic at present, but how long will it be before they will want to ren der treatment as well?

3 The need for good diagnostic general practitioners and, perhaps, the overemphasis of specialized training

4. The cost of medical care, especially the in creased cost of hospitalization, should make us all stop and think where it is going to stop and how long can the hospitals keep going before seeking relief from the taxpayer either city, state, or federal government and if this occurs what influence will this have on the private practice of medicine

5 There are within the government and certain powerful minority groups, many who desire some form of federalized medicine The drive is ever on Let us never give up the fight. Look at the plight of the British physician today

6 The continued and increased support of the voluntary nonprofit insurance plans sponsored by the Medical Society and by the entire profession is the need today

7 There is a definite movement by the hospital administrators to demand payment in ward cases for medical care from the medical plans This is a prac tice which should never be allowed to exist. It can only lead to placing the hospital more and more in the practice of medicine Only physicians should be paid for services rendered by them

8 Nursing care is an important factor in the care of the seriously ill, and the cost of this service has been steadily rising thus adding greatly to the cost of medical care

SPEAKER ANDRESEN This report really should have been in a month ago so you could have read it for yourselves It will be referred to the Reference Committee on Report of the Council Part VI of which Dr Edward P Flood is the chairman

Are there any other supplementary reports?

There was no response

SPEAKER ANDRESEN Are there any resolutions to be introduced at this time?

Section 64 (See 111)

Report of the Temporary State Commission on Coordination of State Activities (Second Interim Report, March, 1948; The Wicks Commission)

DR NELSON W STROHM, *Vice-Speaker* I would like to present a resolution, Mr Speaker and mem bers of the House of Delegates I apologize for its length but I am encouraged to give it to you be cause of its importance. I bring it to you as chair man of the Council Committee on Medical Licen sure. The subject of it is The report of the Tem porary State Commission on Coordination of State Activities better known as the Wicks Commission

"WHEREAS, a mimeographed copy of the report of the Temporary State Commission on Coordina tion of State Activities (second interim report, March, 1948) (the Wicks Commission) has been re viewed, it is a voluminous report of probably over 400 printed pages which is in the hands of the printers and will probably not be received before July or August Excerpts have been taken from this report and have been distributed to the officers of the State and county societies and other bodies that would be interested and it is thought advisable that some of these recommenda tions be brought to the attention of the House of Delegates for its information and action,

"WHEREAS the following recommendations have been made

"1 The Medical Practice Act should be amended to provide that physicians who fail to register shall be deemed illegal practitioners

"2 The various professional laws should be amended to eliminate all provisions compelling registration with the County Clerk.

"3 To eliminate the uncertainty as to jurisdic tion and authority among various officials con cerned with professional law enforcement, their functions shall be clearly defined and the limits of their authority explicitly stated through the adoption of appropriate rules and regulations and manuals of procedure and through necessary amendment of the Educational Law

"4 The adoption of enforcement of profes sional laws shall be abolished In lieu thereof there shall be established in the Division of Profes sional Education a Bureau of Investigation which shall be charged with the responsibility of making all investigations pertaining to the administration and enforcement of the Professional Laws

5 The granting of injunction to enjoin the illegal practice of the professions shall be provided without the necessity of showing the absence of another adequate remedy or that irreparable damage would result from its denial To obtain such injunctive relief, express statutory authority similar to that now contained in the Pharmacy and Veterinary Medicine Acts shall be included in the proposed article supplementing the profes sional acts

6 Upon the request of the Bureau of Inves tigation the hearing upon the charges shall be held by a hearing officer appointed by the Re gents For this purpose the Regents shall pro vide as many hearing officers as are necessary who are specially qualified to conduct hearings and to prepare findings and recommendations. Two members of the Professional Board involved shall sit as observers at all hearings for and in behalf of the Board

'7 Recommendation abolishing the Board of Examiners and Advisory Councils (there are several)

'8. The department shall either comply with the law, or if the law has proved to be unworkable it should seek to have it amended to conform to practice

9 The determination of credits in all profes sions should be solely the function of the Bureau of Professional Education

10 The Secretary's Office shall forthwith review the status of all such applications, dismiss those which remain incomplete by a predeter mined date.

11 All these applications shall be received and evaluated by the Bureau of Professional Education

' 12 Applications for dispensation of regular requirements for admission to examinations or other licensure shall not be reviewed by the Department Council.

'13 The evaluation of applications for licen sure without examination or other admission to examinations involving dispensation of regular requirements should continue to be performed by the Assistant Commissioner While undoubtedly an operating function the evaluation of such applications is of major importance and should be segregated from the evaluation of routine applica tions for licensure Involved in these applications

are questions of policy-making and precedent-making that are properly the concern of the Assistant Commissioner

"WHEREAS, it can be seen that the above contemplated recommendations are far-reaching, involving important changes in the Educational Law governing discipline and licensure in the medical profession It is most important that the medical profession make known its opinion in respect to these changes at an early date and that these opinions be sent to Senator Wicks and the Board of Regents of the Department of Education, therefore be it

"*Resolved*, that the House of Delegates assembled record their disapproval of the following recommendations Numbers 1, 2, 4, 6, and all its subrecommendations, number 7 and its subrecommendations, and numbers 9, 11, 12, and 13, and that approval of the following recommendations be recorded Numbers 3, 5, 8, and 10"

SPEAKER ANDRESEN Referred to Reference Committee on the Report of the Council, Part XII, of which Dr Joseph A Geis is the chairman

Section 65 (*See 103*)

Malpractice Insurance and Public Relations (Alameda County Plan)

DR. FREDERICK S WETHERELL, *Onondaga* Mr Speaker, members of the House, and distinguished guests, the subject of this resolution is Malpractice Insurance and Public Relations I sat with your hardworking Reference Committee on Malpractice Insurance and Defense yesterday and thought that they were going up the wrong alley to change the present situation of malpractice defense and insurance I even heard the threat that some county societies might withdraw from the general plan of malpractice defense and insurance because their incidence was so low I am using the term "public relations," but the term "public relations" which I am using is not the one which you are acquainted with It is something entirely different. The meaning is entirely different as explained in the current number of the *Bulletin* of the Onondaga Medical Society where the word "public relations" is debunked

"WHEREAS, it is apparent that the cost of malpractice insurance is constantly increasing, and

"WHEREAS, everything that might cause a malpractice claim is a source of bad public relations, and

"WHEREAS, the elimination of these causes serves also to eliminate one category of causes of bad public relations, and

"WHEREAS, among these causes are injury to a patient through negligence or ineptitude, criticism of a colleague's work, made to a patient by another physician, abandonment of the patient, failure to treat each patient with meticulous attention to the requirements of good medical practice, using undue optimism in prognosis, failure to give the patient a clear understanding of the diagnosis or treatment, and

"WHEREAS, it has been proved that removal of these causes by the institution of a militant public relations program has resulted in the practical elimination of malpractice suits, and

"WHEREAS, the Alameda County, California, Medical Society has instituted a plan of medical public relations which has resulted in eliminating malpractice suits for the past two years, be it

"*Resolved*, that the Council of the Medical Society of the State of New York be instructed to study the Alameda County Plan, and as soon as feasible to institute procedures which will end in the employment of measures of like nature in the constituent county societies or district branches of the Medical Society of the State of New York"

SPEAKER ANDRESEN Referred to the Reference Committee on Report of the Malpractice Insurance and Defense Board and Report of the Legal Counsel, of which Dr Abraham Koplowitz is chairman

Section 66 (*See 141*)

Proposal to Create a Committee on Emergency Preparedness

DR WALTER P ANDERTON, *Secretary* Mr Speaker, as a result of a communication to the Society from the American Medical Association, and as a result of Dr Lull's and Dr Engel's speeches this morning, I move that the President be empowered to appoint a Committee on Emergency Preparedness

DR HARRY ARANOW, *Councilor* I second the motion

SPEAKER ANDRESEN That will have to be referred to a Reference Committee, I believe

SECRETARY ANDERTON I take the liberty of suggesting that this long and arduous motion could be voted on immediately and not necessarily referred to a reference committee

SPEAKER ANDRESEN I am informed that the President's Report contained a recommendation to that effect Therefore, I would like to refer that motion also to the Reference Committee on Report of the President, of which Dr Phillip D Allen is chairman

Section 67 (*See 162*)

Isotope Committee

DR LAURANCE D REDWAY, *Literary Editor* I would like to introduce a resolution in behalf of myself and Dr Norman S Moore, of Ithaca, on the subject of an Isotope Committee

"WHEREAS, the policy of the United States Atomic Energy Commission is liberal with respect to the relation of radioactive isotopes for research in general, and

"WHEREAS, consequent upon this farsighted policy of the Commission many more radioactive materials will be handled by an increasing number of people, and

"WHEREAS, the danger to technical personnel and the public through carelessness or lack of uniform protective measures in dealing with these materials will increase, and

"WHEREAS, in the event of the emergency of mass radiation immediate protective measures would be imperative, now be it

"*Resolved*, that the Medical Society of the State of New York, acting in the public interest, instruct its Council to create an isotope committee for the purpose of coordinating the protective measures now being formulated by various scientific, medical, public health, and industrial groups, and through the educational channels of the Society familiarize the physicians of the State with all known protective measures applicable to peacetime uses of radioactive materials"

SPEAKER ANDRESEN Referred to the Reference Committee on Report of Council, Part V, of which Dr Philip L Forster is chairman

Section 68 (*See 166*)
Insurance Forms

DR. CHARLES GULLO *Livingston* I submit this resolution for the Livingston County Medical Society, which was passed on March 24 of this year It has reference to Insurance Forms

"WHEREAS, physicians are asked to make out many illness and mortality forms of insurance companies and

'WHEREAS the filling of such forms often requires considerable time, and

"WHEREAS those forms are generally never alike, be it

' *Resolved* that the Council appoint a committee to meet with a committee of the Association of Life Insurance Companies for the purpose of standardizing the illness and mortality forms and thereby make them more brief'

SPEAKER ANDRESEN Referred to Reference Committee on Report of the Council, Part VI, of which Dr Edward P Flood is chairman

Section 69 (*See 170*)
Draft of Physicians

DR. B M. BERNSTEIN, *Kings* This resolution has been inspired by the editorial appearing in the *Journal of the American Medical Association* and which I saw yesterday morning

' WHEREAS, the medical profession always has taken, and always will unselfishly take its part in any national emergency, and

' WHEREAS, it would appear that the passage of draft legislation by the Congress is imminent, and

"WHEREAS, indications are that an attempt will be made to adopt a different age differential for physicians from that to be advised for the rest of the available population, and

"WHEREAS, it would appear that an adequate pool of physicians already exists from amongst those educated under government student programs during the last war and as yet not called for duty and from those deferred for a variety of reasons during the last war, and from amongst those now completing or who will complete internships during the next two years, and from those who will volunteer their services, even though not of draft age therefore be it

' *Resolved* that such a differential in age of those eligible for draft would be discriminatory, unnecessary, undemocratic, and contrary to the principles of our Constitution and be it further

' *Resolved*, that the proper committees of the House, Senate, and the presiding officers of those bodies and the Secretary of National Defense and the Secretary of the Army Navy and Public Health Service, and the President of the United States be so advised by the endorsement of this resolution at this session of the House of Delegates and be it further

' *Resolved*, that the Chairman of the National Security Resources Board and the Secretary of National Defense be urged to sanction the creation of a Civilian Medical Board to aid in obtaining the necessary medical personnel which would be required under a selective service draft act and be it further

"*Resolved*, that the Secretary be instructed to transmit these resolutions to the above-named authorities without delay

SPEAKER ANDRESEN Referred to Reference Committee on Miscellaneous Business B, of which Dr William B Rawls is chairman

Are there any further resolutions?

There was no response.

SPEAKER ANDRESEN If there are no other resolutions, we will go on to the reference committee reports The reference committees worked very long and hard yesterday Some of them were still working at five and six o clock Some met in the evening to complete their reports I hope that all of the objectants and all of the proponents of the various proposals that were referred to these committees numbering 38 yesterday have thoroughly discussed their positions, and their various points of view have been reconciled, so we won t need to spend too much time today on them.

We are now ready for the Reference Committee Reports.

Section 70
Report of Reference Committee on the Report of the Secretary

DR. LEO F SCHIFF *Clinton* The report of the Secretary contains membership statistics information relative to the *Medical Directory* and the JOURNAL, some comment on the activities of the Council, and other interesting information relative to his personal activities.

We note a net increase of 779 members, and a death rate among the membership of slightly more than 1.2 per cent. We are interested to know the reasons underlying the resignation of 420 members, slightly more than 2 per cent of our membership

The number of honor counties dropped from 25 in 1947 to 20 in 1948

Appointment of members of this Society to various State Boards and Commissions during the past year are duly noted in the Secretary's report. Certain other activities of the Council are commented upon in the report, but none of these in such a way as to require any action by the House of Delegates such matters coming under the Report of the Council

Under Comments are listed the various meetings which our Secretary has attended including Council and Board of Trustee meetings, as well as seven of the eight district branch meetings and various hearings and conferences. We appreciate that these meetings, casually listed in less than half a column of the report, must have taken considerable of our Secretary's time

We are particularly pleased that our Secretary has been able to assist a number of physicians to find locations for practice and enjoyed as part of his vacation visiting several rural locations whence had come requests for physicians

Our Secretary reports the death on October 10, 1947, of Dr Frederic E. Sondern, Past President of our Society, of which due notice was taken at the opening session yesterday

We are pleased to note the appreciation expressed by our Secretary for the cooperation and consideration shown him by his fellow officers, the councilors, trustees, and members of the staff of the Medical Society of the State of New York We feel his own amiability alert mentality and willingness to work for the good of our Society well deserve such consideration and cooperation.

There are no recommendations in this part of the report, and I move its adoption

DR. MOSES H KNAKOW *Bronx*. I second the motion.

There being no discussion, the motion was put to a vote and was unanimously carried

Section 71

Report of Reference Committee on Reports of District Branches

DR LEO F SCHIFF, *Clinton* As regards the reports of the district branches, these show that each of the eight district branches held an annual meeting, most of them in the fall of the year The meetings consisted of one-day sessions either morning and afternoon or afternoon and evening, and all were attended by our President, Dr Bauer, accompanied by other officials and members of the staff of the State Society Attendance varied from 69 to 201 Programs included formal papers, symposia, panel discussions, and clinics In addition to scientific subjects, various matters having to do with the economic and administrative aspects of the medical profession were presented and discussed

The president of the First District Branch raises the question of the usefulness of branch meetings, at least in the metropolitan area

Since this is the only branch to raise such a question, your Reference Committee recommends that no action be taken in the matter at the present time

May I also say that I understand that the Reference Committee on the Report of the Planning Committee for Medical Policies had this matter under consideration from another angle, so that I do not believe any action is necessary so far as the consideration of the Report of the District Branches is concerned

On the other side of the picture the Eighth District Branch has formed an Advisory Council of presidents and secretaries of the medical societies composing that branch. This Advisory Council has just completed its first year of activity and has met at intervals of two months to consider bills before the State Legislature and to carry on correspondence with various State legislators sponsoring or interested in certain bills It is reported that all meetings have been well attended, and the discussion has been free The last meeting, held on February 12, 1948, included also representatives of the Legislation and Workmen's Compensation Committees of the component counties Among other things done, it was agreed that at future meetings representatives from various county society committees should meet with the Advisory Council to share opinions and to act in concert on matters that might pertain to their respective committees

This we feel is a most commendable plan a step forward in the harmonious working of the component parts of an organized medical group such as ours, and we recommend it for serious consideration by other district branches

I would like to say also that I believe that this particular phase of our activity has been under consideration by the Reference Committee on Report of the Planning Committee for Medical Policies and that you may hear more definite recommendations from them than we are making in our consideration merely of the reports of the presidents of the district branches

Mr Speaker, I move the adoption of this portion of the report

DR HARRY ARANOW, *Councilor* I second the motion

SPEAKER ANDRESEN This involves two parts, doesn't it, the one to disregard the suggestion that the district branches be abolished, and the other one telling what a district branch can do, and commending the branch for it Is that right?

DR SCHIFF Yes

SPEAKER ANDRESEN Is there any discussion on the motion to adopt this portion of the report?

The question was called, and the motion was put to a vote and was unanimously carried

Section 72

Report of the Reference Committee on Report of Censors

DR LEO F SCHIFF, *Clinton* We are informed by the Secretary of the Society that it has not been necessary for the Censors to hold a meeting during the past year as no business came up for them to act upon We congratulate the Society on having passed through another year without need for the services of the Board of Censors

I move the adoption of this portion of the report

DR FREDERICK S WETHERELL, *Onondaga* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 73 (*See 40*)

Report of Reference Committee on Report of Secretary Changing Chest Session to Section

DR LEO F SCHIFF, *Clinton* Reporting on the resolution that the House referred to your Reference Committee presented by Dr Gaffney, of Oneida, and actually discussed in the Secretary's report but omitted in our report on the Secretary's report, because it was going to be presented in the form of this resolution, on the matter of changing the Chest Session to a Chest Section,

"WHEREAS, interest in chest diseases is great as evidenced by large attendance at programs of the Session on Chest Diseases, and

"WHEREAS, great advances are currently being made in the diagnosis and treatment of chest diseases, and

"WHEREAS, more program time is required to present adequately these advances to the profession, therefore be it

"*Resolved*, that the *Session* on Chest Diseases be made a *Section* on Chest Diseases"

This matter was recorded in the report of the Secretary as having been taken up by the Council on November 13, 1947, which voted to recommend that a Section on Chest Diseases be created

Your Reference Committee recommends that such action be approved As you known, this would entitle them to Section Officers and to hold two meetings during our Annual Meeting instead of the one session

I move the adoption of this portion of the report

DR EDWARD A GRIFFIN, *Kings* I second the motion

There being no discussion, the motion was put to a vote and was carried

DR SCHIFF Now I move the adoption of the report of this Reference Committee as a whole

DR JOSEPH A GEIS, *Essex* I second the motion

There being no discussion, the motion was put to a vote, and was carried

SPEAKER ANDRESEN The report is adopted as a whole, and we thank you, Dr Schiff

Are there any other Reference Committees ready to report?

Section 74

Report of Reference Committee on Report of Council, Part XII Medical Licensure

DR JOSEPH A GEIS, *Essex* Your Reference

Committee has noted the statistics quoted in the report of the Council Committee on Medical Licensure and wishes to draw to the attention of this House of Delegates the fact that, despite the propaganda of the state medicine adherents the increase in the number of doctors has not lagged behind the population growth

We also note that the special regulation regarding credit for armed service applies only to those who began service prior to January 1 1947 Soon this will automatically cancel itself

We note with alarm the report that the Education Department expects a large influx of foreign physicians, especially because of the following words in the report

> We understand that it is the policy of the Department of Education of the State of New York that they will not endorse any foreign medical graduate, nor will they admit to medical licensure examination any foreign graduate who has matriculated in medicine after January 1, 1940 "

We agree with the Council Committee that this is sound and sensible but feel that we should know that this is so and not just understand it We agree thoroughly that all foreign applicants must be examined

Inasmuch as our Education Department is questioning the value of the medical education of foreign schools, strong representations should be made to the Veterans Bureau so that they stop their recognition of these schools for veterans' education

We also note that while chiropractors are not and should not be, licensed in this State that the Veterans Administration is paying for this so-called education under the G I Bill of Rights. We greatly fear that this will end in a greater demand for their licensure with the added argument of sympathy for the veterans An attempt should be made to stop this

We also agree with the use of injunction proceedings against illegal practitioners

I move the adoption of this section of the report.

Dr. Peter J Di Natale *Genesee* I second it.

There being no discussion the motion was put to a vote and was unanimously carried.

Section 75

Report of Reference Committee on Report of Council, Part XII Report of Special Committee on Office Administration and Policies

Dr Joseph A Geis *Essex* Your Reference Committee read with approval the report of the Special Committee on Office Administration and Policies. We approve the removal of the offices so that they are all on one floor We especially approve the provisions for annual physical examination of employes Most assuredly we must practice what we preach

We approve the improvements in office routine and feel that these will lead to a marked increase in efficiency Because your Special Committee has put into effect so many improvements in the past year we agree with the report that, for the time being it is unnecessary to spend the money for a survey by outsiders

The Society owes its thanks to this hardworking committee We recommend that this committee be continued I move the approval of this part of the report.

Dr. Harry Aranow *Councilor* I second it.

There being no discussion the motion was put to a vote and was unanimously carried.

Section 76 (See 110)

Report of Reference Committee on Report of Council Part XII Nursing Education

After considerable discussion, was referred back to Reference Committee.

Section 77 (See 27 80)

Report of Reference Committee on Report of Council, Part XII Woman's Auxiliary

Dr. Joseph A Geis, *Essex* Your Reference Committee notes with considerable pleasure the large amount of work done during the past year by the Woman's Auxiliary This has grown so fast and has taken so many burdens from the officers and members of the Society that it is a never-ceasing surprise The *Distaff* has become an important publication to the aims of this Society

How Mrs Pohlmann was able to get to so many sections of the State during one short year is something that your Reference Committee cannot understand It certainly looks as if being president of the Auxiliary is a full time job

This House of Delegates should send a letter of appreciation and thanks for their work

We recommend to the Council that they recommend to the Board of Trustees that the appropriation be increased by $1 000

We worded that last phrase very carefully for fear we would get a rise out of Dr Rooney We wanted to save the time of this House as much as possible.

I move the adoption of that portion of the report

Dr. Frederick S Wetherell, *Onondaga* I second it.

There being no discussion, the motion was put to a vote and was unanimously carried

Section 78

Report of Reference Committee on Report of Council, Part XII Report of Convention Committee

Dr Joseph A. Geis, *Essex* Your Reference Committee wishes to thank the Council Committee on Convention for its difficult work at the last convention

Now that the war is over, we suggest that arrangements be made for tables for the delegates while at the meeting While we had to put up with inconveniences then, it was difficult to take notes, check the program, and hold a cigarette at the same time.

We also recommend that where possible the sessions be held in the headquarters hotel.

We thoroughly approve the presentation of certificates to the fifty year members and recommend that this be made an annual event

We especially feel that the thanks of this House is due to those members and employes of the Society who adopted mops, brooms, etc., at 3 00 A.M to get ready for the opening of the convention Their modesty in not making this a part of their report should not be overlooked.

I move the adoption of this section of the report

Dr. Edwin A. Griffin *Kings* According to the strict sense of the word the war is not yet over It has not yet been declared over

Dr. Geis I would say that I think it is sufficiently over so that we could get tables to put our papers on while we are at this meeting

Dr. Frederick W Williams, *Bronx*. In addition may I also suggest to this Reference Committee that they suggest to the Speaker of the House that on the opening day when he is calling for resolutions an easy orderly way to do that would be to call the

counties in alphabetical order as to whether they have resolutions, rather than have this scramble that we had yesterday morning, "Call me," "Call me," "Call me"

SPEAKER ANDRESEN The Speaker will take that under advisement Thank you

Has that motion for the adoption of that portion of the Reference Committee's report been seconded?

DR ALFRED M HELLMAN, *New York* I will second it

There being no discussion, the motion was put to a vote and was unanimously carried

Section 79 (*See 131*)

Report of Reference Committee on Report of Council, Part XII Report of Committee on Questions on Ethics

DR JOSEPH A GEIS, *Essex* Your Reference Committee agrees with the Council Committee on Questions on Ethics that Section 31(b), Principles of Professional Conduct, adopted at the last meeting of the House of Delegates, was ill advised, and that it be rescinded.

We also believe that the proposed substitute is also improper, ill advised, and poorly worded We recommend that it be not adopted

We recommend that the Council give this further study

CHORUS What is it all about?

DR GEIS Section 31(b), Principles of Professional Conduct, that was adopted last year reads

Publications for the Laity

"Members of this Society who have prepared and written a book, article, or any writing pertaining to medicine, for the laity and intended for publication, shall submit the same to the Council Committee on Public Relations and the Public Relations Bureau of the Medical Society of the State of New York for approval prior to any publication thereof In the event the book, article, or writing shall be so approved for publication, then and in that event any proposed advertisement for or announcement of publication thereof shall be likewise submitted to said Council Committee and Bureau for approval prior to any appearance thereof in print The reviewing committee shall render its opinion without unnecessary delay This committee shall be in the main guided by Section 31 of the 'Principles of Professional Conduct' but shall be empowered to make such concessions as may be practiced and necessary in considering the title of the publication, the description of the content, the responsibility, standing, and reputation of the writer and such other material through which the publisher wishes to arouse reader interest"

That is the one that the Council in its report recommended be rescinded, and that is the report that was adopted last year in Buffalo That is the one that your Reference Committee also recommends be rescinded

The Committee suggests to insert in its place the following, I mean, now, the Council Committee

"Advertisements and Announcements of Publications for the Laity

"In the event that there is proposed any public announcement of or advertising in relation to any book or article or writing for the laity, such proposed announcement or advertising matter shall be submitted to the Council Committee on Public Relations prior to any public appearance of the announcement or advertising matter This reviewing committee shall render its opinion without unnecessary delay It shall be guided mainly by Section 31 of these Principles of Professional Conduct, but shall be empowered to make such concessions as may be practiced and necessary, in considering the description of the title and contents of the publication, the professional standing and reputation of the author, and such other material through which the publisher may wish to arouse interest"

We recommend that that last that I read not be adopted, but that it be referred back to the Council for further study I so move

DR AARON KOTTLER, *Kings* I second the motion

PRESIDENT BAUER As I understand it, this Reference Committee is recommending that the present article in the Code of Ethics be rescinded and that this substitute be referred back Is that correct?

DR GEIS That is correct

PRESIDENT BAUER Gentlemen of the House, the article certainly should be rescinded in my opinion That article was adopted last year I don't know why it ever was adopted because it is a violation of the Constitution of the United States on free speech

CHORUS Why?

PRESIDENT BAUER You cannot possibly dictate to a man what he can write or what he shall say

DR FREDERICK W WILLIAMS, *Bronx* But cannot the members of the Society discipline themselves? We are not dictating to nonmembers

PRESIDENT BAUER The members of the Society can discipline another member if he does anything unethical, but to say he cannot either write or speak without having it approved by a committee of this Society I certainly think is going just a little bit too far I don't think we have any right to do it It ought to be rescinded

DR WILLIAMS We feel that this is not a violation of the Constitution but that it is purely a matter of discipline and controlling the ethics of the members of the Society If you will remember, the cause for the introduction of this particular provision last year was the trial or appeal we had by a man who was brought up before the Board of Censors for just such an incident Because of that incident, we brought in that article, and it influenced our judgment in passing it On behalf of Bronx County, I wish to say we are in favor of retaining what was passed last year

DR BENJAMIN M BERNSTEIN, *Kings* Mr Speaker and Gentlemen, if we are going to adopt a resolution of any kind whereby we seek to censor stuff that goes into print, how about the men who get on the radio and about the men who are going to be sent out by speakers' bureaus to talk to lay organizations day after day? Who is going to censor them? How are we going to determine in advance what a man is going to say when he leaves our headquarters to talk about anything under the sun, whether it be socialized medicine, the treatment of cancer, or what have you?

It seems rather foolish to try and stop a man from writing certain things by first sending it to a committee who shall have the final say whether his stuff is worth while reading or not, yet permitting these men at will to get on the radio—and we have done it for years—to talk about anything we want them to without being able to stop them

DR RENATO J AZZARI, *Bronx* I want to say for Bronx County that we censor everything that is written for or said over the radio first before it is presented

SECRETARY ANDERTON May I inquire from the Chairman of the Reference Committee the reasons why the Reference Committee recommends that the proposed new article not be accepted?

DR. GEIS I might answer Dr Anderton on that by saying that the Reference Committee was unable—maybe it is our ignorance—but we were unable to get any real meaning out of it That is the reason we referred it back to the Council for further study

SPEAKER ANDRESEN Any further discussion? [ ]

DR. JAMES F REULING *Treasurer* Mr Speaker, as chairman of this Committee on Questions of Ethics, I certainly feel that the amendment as adopted last year should be withdrawn I believe the Reference Committee s report should probably be broken down into two parts First, their recommendation that that amendment adopted last year be rescinded If you will consider that carefully it means that if I or any member of this House or any member of the Society write any article or get up and make a speech before a lay body, for example if you are going to talk before a parent teacher's association you must first have that cleared by the Council Committee on Public Relations and the Public Relations Bureau. I think that should be repealed, and I would suggest, Mr Speaker that we divide this into two sections. I would offer a substitute motion for the Reference Committee s report that Section 31(b), "Publications for the Laity, as adopted by the House of Delegates last year be rescinded.

DR. GEIS Without the necessity for a vote the Reference Committee will accept that substitution which will have the effect of voting on these separately

DR. REULING Yes.

SPEAKER ANDRESEN The Chair intended to present it that way First there will be the motion to rescind, and then the motion to approve the referral. I don t think we require any particular motion to do that but we can continue the discussion for a moment more Dr Geis was asked to discuss the reason for having turned down the suggestion of the Council Committee, and he said that he could not make any sense out of it. Does anybody here have anything further to say about that?

DR. WILLIAMS If I may speak again and this is only a brief statement we are not censoring what the man publishes we are only checking it for his ethics I think that is a misumpression given by the men of the opposition

SPEAKER ANDRESEN If there is no further discussion we will go on to the motion to rescind. In view of the fact that this recommendation was made a month in advance, we only require a majority to rescind If it had not been made a month in advance, we would require a two-thirds vote All in favor of rescinding last year s action as recommended by the Council Committee and by the Reference Committee say Aye contrary 'Nay It is declared rescinded

We now come to the second half of the recommendation of the Council Committee in regard to this matter to the Council to report back next year We have had discussion, so all in favor of this say Aye ' contrary Nay It is referred back

DR. GEIS If I may make a suggestion, and if I am out of order say so now that we have repealed 31(b) as adopted and have not adopted the new proposal, is it in order to make a motion that we go back to 31(b) as it was previous to last year so that there is something in the Code of Ethics to cover such a situation? I will ask for your ruling on that.

SPEAKER ANDRESEN I don't see any reason why you could not make a motion to that effect, and I would so rule That would cover us temporarily until the Council reported

DR EZRA A. WOLFF, *Queens* Are we not automatically covered because last year s action rescinded the previous article and put in its place the present one we have now repealed? Therefore our status is as it was before last year's meeting

CHORUS No

DR GEIS We have nothing now

SPEAKER ANDRESEN According to information I have now received it was not amended but it was an addition.

DR. GEIS This motion just passed has rescinded Section 31(b) but does not reinstate anything

SPEAKER ANDRESEN That leaves no provision for that particular thing in our Principles of Professional Conduct.

SECRETARY ANDERTON I think perhaps I can clear the matter up Last year there was an addition passed to Section 31(b) You have now rescinded that addition, which leaves 31(b) the way it was before the action last year

SPEAKER ANDRESEN We will accept that There will be no need for any such motion then Dr Geis.

DR. GEIS I now move the adoption of this report as a whole with the exception of the part on Nursing Education, which the Committee has to reconsider

DR. SAMUEL Z FREEDMAN, *New York* I second the motion.

There being no discussion the motion was put to a vote and was unanimously carried

Section 80 (*See 87, 77*)

Report of Reference Committee on Report of Council, Part XII Woman's Auxiliary

DR. JOSEPH A. GEIS, *Essex* Mr Speaker on a resolution introduced by Dr Beckman, of New York on the Woman s Auxiliary, reading

'WHEREAS, both by word of mouth and in the press we are increasingly made aware of the fine work that the Woman's Auxiliary to the Medical Society of the State of New York is accomplishing in the fields of economics, legislation, public relations and development of good will among our fellow physicians, both on a State and county level now therefore be it

Resolved, that the House of Delegates extend a vote of thanks to the officers and members of the Auxiliary, and recommend that the officers of the State Society and every constituent county society be advised that it is the sentiment of this House that whatever time energy or money that may be used in promotion of the work of this Auxiliary is well invested

We approve of this resolution although it is covered by Report of the Reference Committee on Report of Council Part XII on the Woman s Auxiliary

I move the adoption of this portion of the report.

DR EZRA A. WOLFF *Queens* I second it.

There being no discussion the motion was put to a vote and was unanimously carried.

Section 81 (*See 52*)

Report of Reference Committee on Report of Council, Part XII: Specialty Boards

DR. JOSEPH A. GEIS, *Essex*. Reporting on the resolution introduced by Dr Galluccio on Specialty Boards, reading

"WHEREAS, it has always been the admitted aim of the American Medical Association to encourage hospital affiliations for all physicians, and

"WHEREAS, many hospitals are taking restrictive measures with respect to staff appointments and promotions in order to satisfy requirements established by Specialty Boards, and

"WHEREAS, these requirements of the numerous self-appointed and self-perpetuating Specialty Boards are often arbitrary, variable, and discriminatory, and

"WHEREAS, the accepted method of granting license to practice medicine and surgery is reserved to the various states, and the right to practice a specialty, being a logical extension of this method, should be state-controlled by standards set up through the various state societies and their components, and

"WHEREAS, it has been accepted as a first principle in the administration of American justice that a man be judged by a jury of his peers drawn from his local community, and

"WHEREAS, the Council on Medical Education and Hospitals of the American Medical Association with the concurrence of the Advisory Board for Medical Specialties has stated that

'Hospital staff appointments should depend on the qualifications of physicians to render proper care to hospitalized patients as judged by the professional staff of the hospital and not on certification or special society membership',

and

"WHEREAS, this entire problem presents a challenge to the ability of the American Medical Association to regulate itself with justice to all members and to advance the cause of Public Health and Welfare through the improvement of medical standards, therefore be it

"*Resolved*, that the Bronx County Medical Society through its Delegates request the Medical Society of the State of New York to take measures to arrest and correct this inequitable situation until such time as means may be found to place certification of specialists on a more reasonable, democratic, and local basis, and be it further

"*Resolved*, that failing to obtain cooperation from the various Specialty Boards and hospitals the American Medical Association be requested to withhold recognition from hospitals which make certification by a Specialty Board a necessary qualification for appointment or promotion on a hospital staff, and be it further

"*Resolved*, that the Delegates of the New York State Medical Society to the American Medical Association Convention be instructed to place these resolutions before the 1948 House of Delegates of the American Medical Association"

We approve this resolution We feel that a background of general practice before entering a specialty field is most necessary I so move

DR WILLIAM KLEIN, *Bronx* I second it

There being no discussion, the motion was put to a vote and was carried

Section 82

Reference Committee on Report of Council, Part VII Medical Care Insurance

DR JOHN B D'ALBORA, *Second District Branch* Your Reference Committee reviewed the report of the Subcommittee on Medical Care Insurance and wishes to compliment the Subcommittee for the work they accomplished and the comprehensive progress report they presented

Your Reference Committee recommends approval of the recommendations of the Committee, commending the participating physicians of the Western New York Medical Plan, Buffalo, for the commendable working out of their difficult problem of their general medical coverage contract Your Reference Committee is of the opinion that, because of increasing actuarial experience, this type of contract can be satisfactorily developed under adequate safeguards The subscribing public is showing considerable interest in this form of comprehensive medical coverage contract, and we must solve this problem of good medical care for the public

Your Reference Committee recommends that the Subcommittee on Medical Expense Insurance, the Director of the Bureau of Medical Care Insurance, and the New York State Medical Expense Plans continue to study this problem and strive to arrive at a satisfactory solution as soon as possible

I move we adopt this part of the report

DR PETER M MURRAY, *New York* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

DR D'ALBORA Your Reference Committee approves the recommendation of the Committee in the matter of affiliation of the plans in Associated Medical Care Plans, Inc , under the direction of Dr Paul Hawley It is a desirable step in the right direction, for only through such a nation-wide organization will the necessary knowledge and experience become available to the mutual advantage of all plans

I move we adopt this part of the report

DR RENATO J AZZARI, *Bronx* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

DR D'ALBORA Your Reference Committee recommends that the Committee and the Director of the Bureau of Medical Care Insurance continue the study of the problem of uniform contracts on a State level We believe the ultimate attainment of uniform contracts on a State level is desirable and will be to the advantage of all concerned We believe that a uniform contract providing surgical, in-hospital medical care should be considered on a State-wide basis as soon as it is possible

Your Reference Committee recommends approval of the action of the Committee in instructing the Director of the Bureau of Medical Care Insurance to survey groups of doctors and subscribers in each plan to determine reactions to and experience in the plans The compilation of this information will be helpful to the Committee in suggesting improvements to the various plans

I move approval of this part of the report

DR HARRY ARANOW, *Councilor* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

DR D'ALBORA Your Reference Committee recommends approval of the action of the Committee in instructing the Director of the Bureau of Medical Care Insurance to survey county medical societies in regard to approval of the plan in each operating area The reactions of the various county medical societies to the plan will prove instructive and helpful to the Committee in reporting the results of this survey to the House of Delegates at our next annual meeting

I move approval of this part of the report.

DR. PETER J DI NATALE, *Genesee* I second it.

There being no discussion the motion was put to a vote and was unanimously carried

DR. D ALBORA Your Reference Committee recommends approval of the action of the Committee to publicize medical care plans locally through county society publications by inviting their cooperation to give desirable space to the plans operating in each area, copy to be furnished by local plans and where needed, supplemented by the Bureau of Medical Care Insurance from the State level

I move approval of this part of the report

DR. WILLIAM B RAWLS, *New York* I second the motion

There being no discussion the motion was put to a vote and was unanimously carried

DR. D ALBORA Your Reference Committee recommends approval of the action of the Committee in the development of an informative folder for periodic distribution to doctors, cost to be carried by each plan in proportion to the number desired

I move approval of this part of the report

DR A W MARTIN MARINO *Kings* I second it

There being no discussion the motion was put to a vote and was unanimously carried.

DR. D ALBORA Your Reference Committee recommends approval of the action of the Committee in recommending through the Council Committee on Economics that the Medical Society of the State of New York extend continued approval of the six New York State plans for another year as follows United Medical Service, Inc. Genesee Valley Medical Care, Inc Central New York Medical Plan, Medical and Surgical Care Inc., Northeastern New York Medical Service and Western New York Medical Plan

I move approval of this part of the report.

DR. IRWIN E SIRIS, *Kings* I second the motion

There being no discussion the motion was put to a vote and was unanimously carried

DR. D ALBORA Your Reference Committee wishes to call to the attention of this House of Delegates the phenomenal progress made by the New York State plans during the past year It is far beyond the dreams and expectations of many of us when these plans were first organized

Your Reference Committee recommends a vote of thanks and appreciation to the Director of the Bureau of Medical Care Insurance, Mr George P Farrell, for the comprehensive report of his activities during the past year and to wish him continued progress and success in his assignment.

Your Reference Committee recommends a vote of thanks and appreciation to the Subcommittee of Medical Care Insurance Dr Aaron, the chairman and the members of this Committee have shown a profound knowledge and understanding of the problem of medical expense insurance and have met all issues squarely and efficiently

I move approval of this part of the report

DR. A. WILBUR DURYEE, *New York* I second the motion

There being no discussion the motion was put to a vote and was unanimously carried

DR. D ALBORA Now I move approval of the report in full.

DR. JOSEPH A GEIS *Essex* I second it.

There being no discussion the motion was put to a vote and was unanimously carried

Section 83 (*See 25*)

Report of Reference Committee on Report of Council Part VII Voluntary Insurance by the American Medical Association

DR. JOHN B D ALBORA, *District Delegate* On the resolution introduced by Dr Alfred M Hellman of New York County on Voluntary Insurance by the American Medical Association reading

"WHEREAS it has come to the attention of the medical profession that the American Medical Association is insuring its employes in a commercial company for hospitalization rather than in the Blue Cross Plan and

WHEREAS, this is contrary to the advice given by physicians to their patients and to employe groups and

WHEREAS, this is definitely against the best interests of the medical profession and the patients of the medical profession and

WHEREAS, this is a step that would tend towards compulsory health insurance rather than towards voluntary health insurance, therefore be it

Resolved that the House of Delegates of the Medical Society of the State of New York at its annual meeting May 1948 protest against this method of insuring and instruct its delegates to the American Medical Association to make every effort to have the American Medical Association insure its employes through the Blue Cross Plan

your Reference Committee recommends the following resolution in place of the one presented by Dr Hellman

'WHEREAS, it has come to the attention of the medical profession that employes of the American Medical Association accepted insurance in a commercial company for hospitalization rather than in the Blue Cross plan and

'WHEREAS, this is contrary to the advice given by physicians to their patients and to employe groups, and

'WHEREAS, this is definitely against the best interests of the medical profession and the patients of the medical profession therefore be it

Resolved that the House of Delegates of the Medical Society of the State of New York at its annual meeting May 1948 instruct its delegates to the American Medical Association to make every effort to have the American Medical Association in the future insure its employes through the Blue Cross Plan

Mr Speaker I move approval of this substitute resolution presented by your Reference Committee

DR. IRVING J SANDS, *Kings* I second it

DR ALFRED M HELLMAN *New York.* I would just like to say one word There has been no change made in the resolution There has just been one of the whereases left out, and that is quite agreeable to me

PRESIDENT BAUER I think the House should know a little of the background of this The American Medical Association up until 1947 had always insured its employes through a commercial company In 1947 for hospitalization they insured them in the Blue Cross So far as medical care insurance is concerned, there has never been and is not now any voluntary medical care insurance plan available in the State of Illinois There will be one available the first of July because the Chicago Medical Society is starting such a plan, but there was not, and has not been up to the present time one for medical care insurance

When the contract came up for renewal the Blue Cross said they could not guarantee any rate for the

current year A bid was received from this commercial company which was less and had some further provisions than the Blue Cross had These plans were identified as Plans 1 and 2, and in no way did the employes of the Association know which was which The 700 employes were called in, and they were told the details of the two plans They were not told what the plans were except by the number or letter (I don't remember which it was) and the employes, with the exception of the printers, voted overwhelmingly we will say for Plan 2, which turned out to be this commercial plan

The American Medical Association has approved voluntary insurance of both types, both commercial and nonprofit Some of our states in their medical care insurance carry their insurance through a commercial carrier The state of Ohio does I think the state of Wisconsin does, and one or two others, so there is no violation of the principles that the American Medical Association has adopted in giving the insurance to a commercial company It is voluntary just the same as the Blue Cross is voluntary

The Board of Trustees has to decide these things on a business basis and not a sentimental basis For another year, if the Blue Cross can offer a contract which is as good or better than a commercial company's, it will be accepted

The same on medical care insurance If such a plan is available, as it probably will be after July 1, that also would be considered, but I cannot see where we have violated any of the principles which have been adopted by the American Medical Association in letting this contract for one year to a commercial company The employes approved it themselves, and it is within the principles of the American Medical Association adopted in approving different types of voluntary insurance

I don't feel this Society should go on record as protesting the action of the American Medical Association when this was done, as I say, on a purely business basis and not on a sentimental one

SPEAKER ANDRESEN Is there any further discussion? Dr D'Albora, would you like to comment on that?

DR HARRY ARANOW, *Councilor* I think a sentimental basis is a very important basis at times and

CHORUS We cannot hear you

SPEAKER ANDRESEN Dr Aranow, you had better speak from the platform

DR ARANOW I think, while it is true on a business basis the commercial policy might have been advisable, a sentimental basis is also important The majority of men in the medical profession feel that, for the question of a few dollars, the Blue Cross should have been encouraged and that the American Medical Association should have stayed with the Blue Cross That is the information that I have been able to glean from those I have spoken to about it

DR A. WILBUR DURYEE, *New York* Mr Speaker and members of the House, as a member of the Reference Committee I would like to point out that we removed from the original resolution the question of a protest to the American Medical Association This new resolution embodies in it only a recommendation that in the future they seriously consider the voluntary plans, and it is not putting any demand on them I agree with the last speaker that we should encourage support of these plans that are promulgated by the doctors

SPEAKER ANDRESEN Is there any further discussion?

DR ABRAHAM KOPLOWITZ, *Kings* May I discuss this?

SPEAKER ANDRESEN Yes The motion that has been substituted for the original seems quite innocuous I don't think anybody could take offense at it

DR KOPLOWITZ Mr Speaker and members of the House, I am perfectly willing to forget the sentimental side entirely, but as a matter of public relations I think it was a mistake on the part of the American Medical Association to do that The American Medical Association is spending a lot of money on public relations, yet they turn around and make a mistake like that which is going to hurt the Blue Cross with which we have all been approving and working It may cost a little more, but I personally would like to know whether this commercial company has a general policy embodying such prices and such conditions, or whether they made those specially for the American Medical Association for advertising purposes If it is worth that to them, then it is worth to the American Medical Association a lot more not to allow a commercial company to be able to show the country they can get the American Medical Association's employes as against the Blue Cross Plan It was a mistake, and I am in favor of the resolution

SPEAKER ANDRESEN Is there any other discussion?

DR ARTHUR A FISCHL, *Queens* I thought there was one point in the resolution that requires clarification You have a comparison between the voluntary Blue Cross Plan as opposed to the commercial plan The commercial plan is also a voluntary plan I think Dr Bauer brought that out, too From the resolution comparing the Blue Cross, which is a voluntary plan, to a commercial plan, one might logically infer that the commercial plan is not a voluntary plan

DR KOPLOWITZ The term should be "nonprofit plan" rather than "voluntary plan"

CHORUS Right

SPEAKER ANDRESEN Will you comment?

DR D'ALBORA The resolution as the Reference Committee propose it reads as follows

> "WHEREAS, it has come to the attention of the medical profession that employes of the American Medical Association accepted insurance in a commercial company for hospitalization rather than in the Blue Cross Plan, and
>
> "WHEREAS, this is contrary to the advice given by physicians to their patients and to employe groups, and
>
> "WHEREAS, this is definitely against the best interests of the medical profession and the patients of the medical profession, therefore be it
>
> "*Resolved*, that the House of Delegates of the Medical Society of the State of New York at its annual meeting, May, 1948, instruct its delegates to the American Medical Association to make every effort to have the American Medical Association in the future insure its employes through the Blue Cross Plan"

We felt that would take the sting out of Dr Hellman's resolution by omitting one whereas That part of his resolution was

> "WHEREAS, this is a step that would tend towards compulsory health insurance rather than towards voluntary health insurance"

We also modified the latter part of his resolution,

and we felt that that would better meet the idea that Dr Hellman and all of us had that it was bad personnel or public relations on the part of the American Medical Association, but it is done and there is nothing we can do about it now We only hope that in the future it won t happen again

DR. IRVING J SANDS, *Kings* There is one substitution I would suggest For the words "Blue Cross Plan you should substitute ' nonprofit plan because there are others besides the Blue Cross Plans that are voluntary and nonprofit.

SPEAKER ANDRESEN Would you accept that change?

DR. D ALBORA Yes, but I don t see that that would make any difference

DR. SANDS It would antagonize the others to single out the one plan, the Blue Cross Plan.

SPEAKER ANDRESEN Would you want to accept that, or shall we put that to a vote?

DR. D'ALBORA I will accept that on behalf of the Reference Committee

DR. WILLIAM B RAWLS, *New York* I was going to make that suggestion also, Mr Chairman, that we substitute the words nonprofit voluntary health insurance " That would bring in not only hospitalization but everything else

SPEAKER ANDRESEN Dr D'Albora has accepted that change in the substitute resolution on behalf of the Reference Committee

DR. D ALBORA Right

DR. RAWLS I have been very closely associated as most of you know, in this city with voluntary health insurance, and have worked very hard for it. We received a perfect storm of protest here in New York City when this information came out I had at least fifteen clippings cut out of the newspapers and mailed to me by patients to whom I had talked about voluntary health insurance. At every meeting I have attended recently in New York City gentlemen this thing came up I am not censoring anyone I am not out here to do that, but I do want you to know what we received in New York City as a result of this action was plenty and I do think that it did a lot of harm. I had this brought up to me even in a debate the other night in connection with compulsory health insurance where my opponent said, "Even your American Medical Association does not believe in voluntary health insurance

SPEAKER ANDRESEN I believe that every state society in the country will probably pass a similar resolution and we will have quite a storm in Chicago about it

PRESIDENT BAUER I realize there is a lot of criticism about it, but a lot of it was due to a mistake The term used was "voluntary health insurance This is not voluntary health insurance. It is hospital insurance and has nothing to do with medical care insurance at all It also has nothing to do with compulsory health insurance A commercial plan is just as voluntary as a nonprofit plan as far as that is concerned There may be arguments on both sides of the question as to which is the better type of plan, but I don t think it is necessary to go into that now

I also want to call your attention to one thing the employes pay part of it, and they have a right to say what plan they would like to go into They cannot be wholly disregarded

Dr Lull is here in the House, and I would like to ask the privilege of the floor for Dr Lull to speak. He can say more about this than I can as he was more intimately concerned with it.

SPEAKER ANDRESEN All in favor of granting Dr Lull the floor to discuss this subject say "Aye', contrary "Nay'

Dr Lull you are invited to discuss this subject

DR. GEORGE LULL Mr Speaker and Gentlemen, I am not going to get into any argument about whether this was a good thing or not now I am not here to defend the action of the Committee as to whether it was good for public relations or not but I am going to tell you the facts

A year ago the American Medical Association had no medical insurance whatever but had a commercial insurance for hospitalization They have never had anything but a commercial insurance for medical service, and last year they bought hospitalization insurance from the Blue Cross at my insistence to the Committee I said, "Remember that overy thing being equal we should give our hospitalisation to the Blue Cross if possible ' The Committee met and decided to give the Blue Cross the hospital insurance, but they had to purchase commercial medical coverage They still cannot get anything but commercial medical coverage, because the Chicago Medical Plan does not go into effect, they are enrolling now to go into effect the first of July, and the state of Illinois has sponsored a commercial plan, so that as far as any voluntary medical sponsored plans are concerned they are nonexistent If we want the employes insured for medical and surgical coverage, we have to go to a commercial company until the first of next July

I will show you how it works It works this way The Committee was appointed to study where we could get the best coverage. The Committee had submitted to it a number of pieces of mimeographed sheets, with just what we got and what we paid for, and the Committee decided they would pay 50 per cent for their own coverage and the Association pays the other 50 per cent, and that this combination as put out by this commercial insurance company was the best coverage

This price is the standard price put out by the company and was not any policy that was made especially for the American Medical Association.

Now gentlemen, the American Medical Association wants everybody covered with insurance, and they want them covered by voluntary plans whether they are commercial or not This has nothing to do with compulsory sickness insurance, as a matter of fact, enlisting the insurance companies on our side of this battle has probably carried a certain amount of weight in the fight against compulsory sickness insurance

As I say, I am not going to argue as to whether it was a good public relations move or not Probably no one in this room would have known about it except for a lot of publicity given to it by people who desired to get this publicity distributed all over the United States. Messages were sent out to various state organizations about just what had happened as a matter of fact, I will tell you an interesting thing that happened in one state I got nine telegrams as a result of this One telegram was from the president of this midwestern state society who berated the American Medical Association for taking out commercial insurance I replied as I have replied to each one, with a rather lengthy letter telling him just what had happened He wrote me a letter in a few days and said, 'I just got a long letter from you on something about insurance I think you have made a mistake You must have intended it for Dr So-and-so, whose name is similar to mine I am not interested in it.'

So he came into my office a little later on and I

said to him, "Didn't you send me this telegram?" and I showed it to him "Oh, yes, I did allow my name to be used on that telegram, but I had forgotten all about it"

A lot of this controversy was stirred up Whether it was good or not, that made for bad public relations The American Medical Association has no fight or quarrel with the Blue Cross, but on a cold-blooded basis of selecting what the committee of employes thought was best for them, they selected this type of insurance

As I told the Blue Cross man, he never would come near us until after this was done, and then he came over and protested, "All right, next year a committee will meet to decide a month ahead of time just what coverage we will require for next year"

Whereupon he said, "The Blue Cross does not do business that way The Blue Cross either insures you for good or they don't want your business at all"

Of course, there may be another executive there next year, so we may be able to talk differently to him, but that is the story back of it, gentlemen It is too bad that this controversy was stirred up I can assure you that I sat in on the committee meetings The committee is just as much opposed to compulsory sickness insurance, the employes are, as we are The employes have nothing against the Blue Cross except they thought this was better coverage The Medical and Surgical Plan of coverage has always been carried by a commercial carrier and will have to be until next year Next year the Chicago Medical Society will have a plan available

Thank you very much (*Applause*)

SPEAKER ANDRESEN Thank you, Dr Lull!

Is there any further discussion?

The question was called, and the motion was put to a vote and was carried

Section 84 (*See 31*)

Report of Reference Committee on Report of Council, Part VII Doctors' United Medical Service Rates of the United Medical Service

DR JOHN B D'ALBORA, *District Delegate* The Reference Committee had a further resolution presented by Dr Benjamin F Glasser, of Queens County Medical Society, on Doctors' United Medical Service Rates of the United Medical Service The resolution was as follows

"WHEREAS, the United Medical Service operates with the support and approval of the medical profession, and

"WHEREAS, the United Medical Service is underwritten by the medical profession, and

"WHEREAS, under the underwriting plan the United Medical Service can never be financially embarrassed, and

"WHEREAS, rates for a single person of $1,500 and the family rate of $2,500 were related to the workmen's compensation rate, and

"WHEREAS, Workmen's Compensation rates have now proved inadequate, therefore be it

"*Resolved*, that the Medical Society of the State of New York instruct or secure the dissociation of compensation rates on the schedule of United Medical Service"

Your Reference Committee disapproves this resolution for the following reasons

1 It is understood that Workmen's Compensation Rates will be increased by approximately 20 per cent by September 1, 1948

2 Such an increase in compensation rates will permit increases in payments to physicians participating in the United Medical Service Plan

3 That some basic guide must be maintained to assure a sound financial status of the United Medical Service

4 That final authority for increasing benefits rests with the Insurance Department of the State of New York

I move approval of this report

DR HARRY ARANOW, *Councilor* I second it

DR ARTHUR A FISCHL, *Queens* I am sorry I did not know this was going to come up this morning I was going to prepare a little discussion about this

SPEAKER ANDRESEN Will you come up to the front of the room and speak, please?

DR FISCHL There is only one aspect I would like to mention When you talk about rates which the New York State Labor Department allow you, as they do with your workmen's compensation fee schedule, when you try to make some changes in those rates it takes you five, or six, or even ten years to make a change There have been no changes in the Workmen's Compensation Fee Schedule for a number of years The State Society committees have been working very diligently to bring such an increase about We have had resolutions introduced and passed year in and year out trying to change the workmen's compensation fee schedule We are finally succeeding in a very, very minor, perhaps in an almost negligible capacity, to raise those rates It is very, very difficult to have the United Medical Service Fee Schedule based on a fee schedule which is decided upon by the legislative body of New York State I think it is a very unwieldy way of determining what our fee schedule should be for our own insurance company

SPEAKER ANDRESEN Is there any other discussion?

DR BENJAMIN F GLASSER, *Queens* I would just like to say one word in regard to this resolution that I offered It may well be that the wording was not in the best form, but it was hurriedly proposed The intent, however, is quite clear We are attempting to form a service medical organization sponsored and approved by the Medical Society of the State of New York, a voluntary nonprofit organization, and here we hamstring ourselves with State law, State regulation, State bureaucracy, and a form of State control This is not, in principle, voluntary insurance, because when you attach a State rate to a voluntary organization you recognize, whether you like it or not, the fact that you are accepting State control

About the rates themselves, the State has an interest in protecting its rates It has the interest of protecting the employer, the employe and the doctor, and in order to do that they adjust those rates to what figure they think is proper, and as has been said it takes a long time before an insurance company or an employer would permit you to get an increase in rate, therefore, it takes you a long time before you will ever get an increase in the workmen's compensation rates Before you ever succeed, you have to sit down and ask the chairman of the Workman's Compensation Board to give you an increase in rates That may be necessary because the State protects all of its people, but that is not necessary in the United Medical Service When the funds available are not sufficient, the doctor underwrites that insurance He is bound to give them service Therefore, there is no earthly reason why United Medical Service should secure surpluses upon surpluses Regardless of what sized surplus it is, they don't need the money

Gentlemen my purpose here is simply to tell you that it is absolutely unfair to connect up a voluntary insurance plan with a workmen's compensation fee schedule that is regulated by the State It is not flexible It is not feasible It is not necessary

SPEAKER ANDRESEN I have two gentlemen I want to call to speak The first is Dr Arnow who is an expert on legislation in fact, he is the chairman of our Council Committee on Legislation, and then we will next call upon Dr Elliott, who is the founder of all of our medical plans.

DR. HARRY ARANOW *Councilor* I am not speaking as a member of the Legislative Committee but as a member of the Board of Directors of the United Medical Service I was there when it was organized We have been there through all of this time. It is an organization which is entirely controlled by medical men who are out for your interest more than anything else The reason we tied it on to the workmen's compensation fee that was given at that time is because it was higher than any fee that any insurance company paid There is no law about it. We can change it tomorrow We can change it any day we deem it wise to do so It was only a temporary expedient to gauge our fees used largely at that time because, as I said, the workmen s compensation fees were the highest fees that were paid by any insurance company We used those to protect the doctor but there is no law in our Constitution nor any thing in the organization of the United Medical Service that binds us to it. We can change it at any time If Dr Elliott is here, he knows more about it than I do and he will tell you that, too

DR FREDERIC ELLIOTT Mr Speaker and Gentlemen I am very pleased to have this opportunity to clear the misunderstandings which have been given you on this subject At the time that this U M S Plan was organized, it was necessary to establish and file with the Insurance Department a schedule of allowances to be made on claims for services rendered by doctors to our subscribers It was necessary also to establish a rate of charge to the subscriber There was no complete, satisfactory, factual bed either of proposed schedule of allowances, or of proposed rate, or of expectancy of utilization We turned first to the workmen s compensation fee schedule as the best of available data on what factors the doctor should reasonably expect to receive as a minimum compensation or recompense for services rendered to persons in moderate and low income groups.

That schedule at the time we organized had been functioning under the Workmen's Compensation Law of the State of New York for some ten years It had stood the test of time Our actuaries taking that and combining it with the available information from various sources of the expected utilization of our contract calculated a premium rate

At the time U M S asked for and received the sponsorship of the Medical Society of the State of New York, our directors made a commitment to the medical profession that our schedule of allowances would at least conform to the workmen s compensation fee schedule There is nothing in either the Insurance Law or in the Constitution and Bylaws of the United Medical Service which limits us to that minimum We may go as far beyond that as our board of directors and our experience may justify but we may not go below that schedule

At the present time, for your information we are setting in effect a study to go back to at least one thousand dollars within our territory to establish from them factual data on prevailing fees, and we shall undertake to develop a more complete schedule. There is none in existence today from any source and that will be brought back to this House of Delegates a year from now for your considered action

I assure you that this resolution is not clear to me *as to its purpose* If it was written with the idea that we are hamstrung by what any State agency, the workmen's compensation, or labor department, may do, that is not true and it is not necessary to adopt this resolution As I read the resolution, the only thing that it would do would be to release United Medical Service from its prior commitment of at least conforming to the State schedule

I assure you gentlemen that the board of directors of our organization have certain definite things in mind We recognize that the moment we fail to pay one hundred cents on the dollar of our commitments under our contracts we should close up shop The Board is very, very conscious in its determination that we shall at least at all times fulfill the terms of our contract in the payments to doctors Beyond that, we recognize that this is a growing experience. We have accumulated four years of that experience We are now in the process of a careful analysis of that experience, and we shall reconcile three important factors the incidence of claim the receipts that we can receive or obtain in payment for our contracts and allowances for the doctors, and the establishment of reasonably proper reserves to meet any unusual contingency All of this is in the hands of the representatives of this House The board of directors of United Medical Service by its Constitution must have on it at all times a majority of practicing physicians The names of those physicians are submitted to your Council for approval, and in the four years of our existence there has been no time at which there has been the slightest conflict between the lay members of our board and the medical members There is an excellent relationship in mutual confidence, and I am confident in my own mind from daily contact with this whole administration that they are undertaking to serve to the best interests of your public and you, and when we fail to do that we know that we should quit.

Thank you! *(Applause)*

SPEAKER ANDRESEN Members of the House you see why I insisted so yesterday that everybody go to and give his discussion to, the reference committees We are taking up an awful lot of time with discussions this morning that could very well have taken place in the reference committees. If we had the proper confidence in our reference committees, that they had had such meetings and had listened to all of the objectants and all of the proponents, then we would be more free to adopt the recommendations of our Reference Committee and not have such long arguments.

Are there any further questions or discussion? If not, the question will now be put to a vote

CHORUS What is the question?

SPEAKER ANDRESEN Dr D Albora, will you repeat the Reference Committee s recommendation on this resolution?

DR. D ALBORA Your Reference Committee disapproves this resolution for the following reasons

1 It is understood that Workmen s Compensation rates will be increased by approximately 20 per cent by September 1 1948

2 Such an increase in compensation rates will permit increases in payments to physicians participating in the United Medical Service Plan and

3. That some basic guide must be maintained to

assure a sound financial status of the United Medical Service

4 That final authority for increasing benefits rests with the Insurance Department of the State of New York

Mr Speaker, I would say, after listening to Dr Elliott on this subject, we eliminate all of the reasons and just disapprove of the original resolution as presented by Dr Glasser

SPEAKER ANDRESEN You are now substituting another motion for the one that had been proposed, isn't that right?

DR D'ALBORA We disapproved of the resolution

SPEAKER ANDRESEN An affirmative vote disapproves of the resolution introduced by Dr Glasser

The motion was put to a vote and was carried

SPEAKER ANDRESEN The Reference Committee's recommendation is adopted, and the resolution of Dr Glasser is disapproved

Section 85 (*See 5, 6, 7*)

Report of Reference Committee on Report of Board of Trustees and Report of Treasurer

DR IRWIN E SIRIS, *Kings* The Reference Committee has reviewed the Report of the Trustees and that of the Treasurer with the supplementary reports with approval and recommends that they be accepted as presented

It wishes to make the following recommendations pertaining to the publication of the *Directory*

Whereas, the *Directory* that was published cost approximately three times what it had been anticipated, and in view of the fact that the anticipated cost of the new *Directory* is unpredictable due to the high cost of compiling and printing, the Committee recommends that the *Directory* be published once every three years

There are approximately 8,000 doctors in the States of New Jersey and Connecticut who contribute nothing to the compiling of their names in the *Directory* In view of the fact that approximately only 200 copies were sold to physicians in the States of New Jersey and Connecticut, the Committee recommends that the Council consider the advisability of discontinuing the publication in the *Directory* of the names of the physicians residing in the States of New Jersey and Connecticut, until some means can be devised to interest these physicians in defraying some of the cost of compiling their names and their publication in the *Directory*

The Committee wishes to commend the Board of Trustees and the Treasurer for their commendable efforts in behalf of the Society

The Reference Committee moves the adoption of its Report on the Board of Trustees' and Treasurer's Reports

DR HOMER J KNICKERBOCKER, *Ontario* I second the motion

DR JOHN J MASTERSON, *Trustee* I would like to amend that resolution that the *Directory* be published every two years instead of every three years It requires a tremendous amount of work on the part of our office staff to compile this directory We have to train these people, and it takes a long time to train these employes to do this special work If we decide to publish the *Directory* every three years instead of every two, it would mean that these trained people would have to be let out, and then a year before we start the *Directory* again we would have to employ new people at a considerable expense and loss of time, so I would like to amend that so that the *Directory* be published every two years instead of every three

SPEAKER ANDRESEN Will you accept that amendment?

DR SIRIS Yes, I will accept it for the Reference Committee

SPEAKER ANDRESEN The report is amended accordingly, so we won't have to vote on that phase of it

DR JOSEPH A GEIS, *Essex* On this question of discontinuing the listing of New Jersey and Connecticut doctors' names in the *Directory*, before such a step is taken we should find out whether it will make any difference in our advertising rates due to the smaller list of names published That should be seriously considered first as to whether that would cut down the income of the *Directory* through loss of advertising That should be taken into consideration before we decide on eliminating the names of men practicing in our neighboring states

SPEAKER ANDRESEN We will ask Mr Dwight Anderson to enlighten us on this subject He is the one who has charge of it

MR DWIGHT ANDERSON Mr Speaker and members of the House, there are two factors involved in the income on our *Directory* One of them is advertising and the other is volume sales to other than members Last year we increased the price of our *Directory* to others than members from $5 00 to $12 50, and our income increased from $8,000 to $14,000 as a result thereof The people who buy this *Directory* are life insurance companies and other persons who want lists of doctors, addresses, and some information about them Drug houses buy them for the purpose of using them with their detail men It may very possibly be that the absence of the New Jersey and the Connecticut lists would seriously affect the sale of volumes, which is income It might also seriously affect the advertising in the *Directory* It may be that we will wish to dispense with advertising in the *Directory* entirely due to the fact that unfortunately the net from that source is very little Our gross was $21,000, our costs were $13,000, leaving us $8,000, and out of that we had to pay the printing, the paper, and the composition on the advertising pages I have not yet, since the report of the auditors was received, had an opportunity to calculate what our net was, but it is very slight That might be something we would wish to eliminate entirely, selling only the back cover, the end sheets, and those parts of the sections now sold for advertising that we would print anyway You see we buy this expensive coated paper for the whole advertising section of 64 pages, and we are printing with the next issue 25,000 copies, which is a tremendous cost Our cost per page of the *Directory* runs $73 That is the cost of printing and mailing, which is a job The book costs $4 00 As you gentlemen know, if you are buying any popular book, books that used to sell for $2 50 you are now paying $4 00 and $5 00 for, so we cannot be immune to these increased costs

All I wish to say is that I hope you will leave it discretionary with the Committee to make these two decisions and do not decide something by which we might be bound upon a later finding that there was or was not a surplus and advantage to be obtained by something contrary to your decision here today

SPEAKER ANDRESEN Thank you, Mr Anderson! The Reference Committee really only recommends It does not make it mandatory, so that is taken care of

Is there any further discussion?

DR MASTERSON Do I understand then that the elimination of physicians in New Jersey and Con-

necticut and the elimination of advertising is left to the discretion of the Publication Committee?

DR. SIMS To the Council

DR. MASTERSON Directly left to the discretion of the Council?

DR. SIMS Yes.

DR. MASTERSON All right.

The question was called, and the motion was put to a vote and was unanimously carried

Section 86 (*See 88 155*)

Report of Reference Committee on Reports of Board of Trustees and Treasurer Exemption from Dues Payment by Men in Military Service

After discussion, was referred back to Reference Committee

Section 87

Report of Reference Committee on Constitution and Bylaws Proposed Amendments to Article VI of the Constitution and Chapter III, Section 3, of the Bylaws

DR PETER J DI NATALE, *Genesee* This is the report of the Reference Committee on Constitution and Bylaws. I first desire to thank the members of my committee They are Dr Gibson, of Onondaga, Dr Clemans, of Fulton Dr Wolff, of Queens, and Dr Kiley of Saratoga.

I too wish to thank Dr Bauer and all of those who appeared before this committee yesterday afternoon. I am passing out bouquets now the bricks will come later

I want to mention that the American Medical Association at the present time has approximately 130,000 members, and they have nine members on the Board of Trustees.

Your Reference Committee on Constitution and Bylaws has considered the proposed amendments to Article VI of the Constitution and to Chapter III Section 3, of the Bylaws, as introduced by Dr Louis H Bauer President.

The proposed change to Article VI of the Constitution, as proposed by Dr Bauer would make it read

'The Board of Trustees shall consist of nine members elected by the House of Delegates in accordance with the Bylaws The President, Secretary, and Treasurer shall sit with the Board of Trustees with voice but without vote.'

Article VI of the Constitution as it reads at present is

'The Board of Trustees shall consist of five members, elected by the House of Delegates in accordance with the Bylaws The President, the Secretary, and the Treasurer shall sit with the Board of Trustees with voice but without vote

The proposed change to Chapter III Section 3 of the Bylaws, as proposed by Dr Bauer would make it read

'Two trustees shall be elected annually except every fifth year when but one shall be elected each to serve for five years In case of a vacancy a trustee shall be elected for the unexpired term, provided that at the session of the House of Delegates at which this amendment is adopted one trustee shall be elected for five years, one for four years, one for three years, one for two years, and one for one year that at the next four annual sessions, two shall be elected for five years No trustee shall serve for more than two terms, but a trustee elected to serve an unexpired term shall not be regarded as having served a term unless he has served three or more years.

Section 3, of Chapter III of the Bylaws as it reads at present is

One trustee shall be elected annually for a term of five years In the event of a vacancy, a trustee shall be elected for the unexpired term.'

Your committee met with various members of our Society, including Dr Bauer and members of the Board of Trustees, and after considerable discussion and a study of the presentation of information, your committee feels that this proposed amendment be not approved Your committee feels that the Board of Trustees has at present acted well and wisely in handling the financial matters of this Society We further feel that the increase in membership of this Board will not necessarily increase the efficiency of this Board It may and could become unwieldy We also feel that we must protect the financial position of our Society even though this proposed increase would only cost several hundred dollars We feel that it was unwarranted and unnecessary

I move the adoption of the recommendation of the Committee

DR. HARRY ARANOW, *Councilor* I second it.

SPEAKER ANDRESEN The Committee recommends that the changes be disapproved, and that will keep our Board of Trustees at five as it is at present constituted Is there any discussion?

The question was called and the motion was put to a vote and was carried

Section 88 (*See 45*)

Report of Reference Committee on Constitution and Bylaws Enlargement of Council Committee on Workmen's Compensation

DR. PETER J DI NATALE *Genesee* One resolution was referred to us on a proposed amendment to enlarge the Council Committee on Workmen s Compensation introduced by Dr O Gorman of Erie

WHEREAS, the Constitution of the Medical Society of the State of New York limits the membership of the Council Committee on Workmen s Compensation to three, and

WHEREAS there exists a definite need for enlargement of this Committee so as to give it wider representation, now therefore be it

Resolved, that the Constitution of the Medical Society of the State of New York be amended by inserting in Article IV Section 10 thereof after the sentence beginning with 'The membership of Committees' and ending with of the Bylaws' the words and the Committee on Workmen s Compensation (k) Chapter IV Section 9 of the By laws

Your committee was presented with this proposed amendment with regard to the enlargement of the Council Committee on Workmen s Compensation Your committee cannot take any action on this amendment because this is a proposed change in the Constitution and must go through the usual procedure of all such amendments.

I believe that has to lay on the table for one year?

SPEAKER ANDRESEN That is correct

DR. DI NATALE So we took no action on that resolution That completes our report.

SPEAKER ANDRESEN Thank you, Dr Di Natale We have now a question before us as to what we are going to do next It is quite evident that we have a great many reference committee reports still to take up It has been suggested that we adjourn now or in a half hour and then come back at two

o'clock for our executive session My suggestion just now to the people at the table was that we declare a five-minute recess and get a little cooled off and then go on to one o'clock. I am afraid if we don't finish here today we may have to have a night session to complete our work, and most of us would prefer not to do that Does it meet with your approval to do that?

CHORUS Yes

At this point there was a five-minute recess

SPEAKER ANDRESEN We have a few new resolutions to introduce

Section 89 (*See 135*)

Premature Publicity of Medical Matters by State Officers

DR ALFRED ANGRIST, *Queens* I apologize for the lateness of these resolutions, but they are matters that came up in discussion in the committee, and I was asked to present them to you at the earliest possible moment, which is as of now

The first resolution deals with the question of the premature publicity of medical matters by State officers, and I think it will be self-explanatory if I read it

"WHEREAS, it has been the policy of governmental agencies in the past to promote press releases on the expansion of services and the introduction of new programs which involve the physicians of the community, when the cooperation of the local physicians is both desirable and necessary,

"WHEREAS, subsequent discussions for modification of the projected program to render it effective and efficient, improperly place the physicians in the light of obstructing such expansion of services to the public, therefore be it

"*Resolved*, that the Medical Society of the State of New York go on record as advising the interested governmental agencies that the Medical Society of the State of New York is always ready to conduct preliminary discussions about such projects which involve medical service and the allied branches of activity of the government, before press releases are promoted on such matters"

SPEAKER ANDRESEN That will be referred to the Reference Committee on Report of the Council, Part XI, of which Dr Theodore J Curphey is the chairman

Section 90 (*See 136*)

State Expansion of Laboratory and Diagnostic Services

DR ALFRED ANGRIST, *Queens* The second resolution, sir, deals with the projected expansion of State laboratory and diagnostic services I think it will be self-explanatory

"WHEREAS, the question of expansion of diagnostic facilities, including laboratory work, BCG, and x-ray studies is contemplated throughout the City and State of New York, and

"WHEREAS, it is the considered opinion that existing facilities are in need of more adequate staff and funds, therefore be it

"*Resolved*, that the Council state its willingness to appoint representatives familiar with these services, who, together with the Health Departments of the City and State of New York, study the entire problem with a view of adequately staffing existing facilities before considering the expansion of such facilities"

SPEAKER ANDRESEN That is referred to the Reference Committee on Report of Council, Part XI, of which Dr Theodore J Curphey is the Chairman

Section 91 (*See 143*)

Redistricting District Branches

DR STEPHEN R MONTEITH, *Rockland* This concerns the redistricting of District Branches

"WHEREAS, Article 11, Section 3, of the Constitution of the Medical Society of the State of New York states,

'Changes in the number of membership of these district branches may be made by a two-thirds vote of the House of Delegates at any annual meeting',

and

"WHEREAS, the district branches as at present constituted do not include in all instances counties with similar problems in economics and public relations, and

"WHEREAS, the activity of the Eighth District Branch has demonstrated during the past year the organizational value of the district branch, therefore be it

"*Resolved*, that the House of Delegates of the Medical Society of the State of New York refer with power to act to the Council the matter of redistricting the county medical societies into district branches with the creation, if necessary, of a Ninth District Branch"

SPEAKER ANDRESEN That is really a constitutional amendment

DR MONTEITH No

SPEAKER ANDRESEN That is referred to the Reference Committee on Report of Planning Committee for Medical Policies, of which Dr Thomas M *D'Angelo is chairman*

Section 92 (*See 165*)

Practice of Medicine by Hospitals

DR B M BERNSTEIN, *Kings* This resolution deals with the practice of medicine by hospitals

"WHEREAS, there is an increasing tendency on the part of hospitals to employ full-time directors of services in other fields of medicine in addition to those already in operation in radiology, pathology, and anesthesiology, and

"WHEREAS, such a program is a definite threat to the individual and private practice of medicine, and

"WHEREAS, such a plan would appear to place hospitals in the business of practicing medicine, and

"WHEREAS, such a procedure, if left uncontrolled and uncurbed, except in the matter of undergraduate teaching of medical students, might lead to unforeseen difficulties for the practice of medicine, therefore be it

"*Resolved*, that the Council be instructed to set up a special Hospital Relations Committee to study this problem and to use its efforts to prevent hospitals from practicing medicine and interfering with the private practice of medicine and to use all moral and, if necessary, legal methods for this purpose"

SPEAKER ANDRESEN Referred to the Reference Committee on Report of the Council, Part VI, Economics, of which Dr Edward P Flood is chairman

Section 93 (*See 169*)
Automobile Agency

DR. IRVING J SANDS, *Kings* I wish to introduce the following resolution

'WHEREAS it is becoming increasingly difficult for physicians to purchase automobiles, and

WHEREAS, the automobile is a part of the doctor's equipment in his practice of medicine, therefore be it

"*Resolved*, that the Council of the Medical Society of the State of New York be instructed to explore the possibilities of establishing an agency for the purchase of automobiles by doctors"

SPEAKER ANDRESEN Referred to the Reference Committee on Miscellaneous Business A of which Dr Frederick Williams is the chairman

Section 94 (*See 57*)
Report of Reference Committee on Report of Council, Part X Workmen's Compensation. To Amend the Law to Abolish the Medical Practice Committee

DR. FREDERIC W HOLCOMB *Ulster* The first resolution referred to the Reference Committee on the *Report of the Committee on Workmen's Compensation* was introduced by Dr Frank Cerniglia, of Queens reading

'WHEREAS compensation practice in the counties of New York, Brooklyn Bronx and Queens (of over one million population) under the control of the Medical Practice Committee is discriminatory and not conducive to good administration of the Workmen's Compensation Law therefore be it

'*Resolved* that the New York State Medical Society urge the Legislature of the State of New York to amend the Workmen's Compensation Law to abolish the Medical Practice Committee be it further

Resolved, that the support of the county medical societies outside the metropolitan area is urged in order to re-establish a uniform administration of the law throughout New York State.

Your Reference Committee recommends the approval of this resolution and I so move

DR. FREDERICK S WETHERELL, *Onondaga* I second the motion

There being no discussion the motion was put to a vote and was unanimously carried

Section 95 (*See 54*)
Report of Reference Committee on Report of Council, Part X Workmen's Compensation. Fee Schedule

DR. FREDERIC W HOLCOMB, *Ulster* I have another resolution that was referred to your Reference Committee, introduced by Albany County reading

'In view of the long delay in satisfactory revision of the Workmen's Compensation Fee Schedule of the State of New York which has not been materially altered since its establishment, and in view of the greatly increased costs of the practice of medicine during the recent years be it

Resolved, that the Delegates from the Medical Society of the County of Albany be hereby instructed to present to the annual meeting of the House of Delegates of the Medical Society of the State of New York to be held in May 1948, this our protest against the long delayed action of the Workmen's Compensation Board and the State Medical Society which delay has resulted in an unfair financial loss by the physicians of New York State

Your Reference Committee recommends that inasmuch as the Revised Fee Schedule has been changed and will go into effect on September 1, 1948 that no action be taken on this resolution.

It should be pointed out that the function of the State Medical Society is advisory in these negotiations and not administrative or legislative

I move the adoption of the recommendation of the Reference Committee

DR. HARRY ARANOW *Councilor* I second it.

SPEAKER ANDRESEN Approval of the report of the Reference Committee carries with it no action on the resolution Is there any discussion?

The question was called and the motion was put to a vote and was unanimously carried

SPEAKER ANDRESEN No action is taken on the resolution

Have you anything further?

DR HOLCOMB I have the entire report on the Workmen's Compensation Committee if you care to have it now

SPEAKER ANDRESEN Yes.

Section 96
Report of Reference Committee on Report of Council, Part X Workmen's Compensation

DR. FREDERIC W HOLCOMB *Ulster* This is a long report, and if the delegates could follow along their Council Report in this matter, paragraph by paragraph it would be easier to present this because we have tried to summarise and reflect our feeling rather than give you long extracts from each paragraph in other words we are trying to give you the sense of it in our recommendations rather than making this a terrifically long report

I might say too that our Reference Committee did a great deal of work on this and at times we felt somewhat as though we were up in the Polo Grounds You know there are always a lot of ball players and umpires on the field, but we found there were a great many in the grandstand too

In regard to better representation throughout the State in matters of compensation your Committee recommends 'that regional representation from the *eight district branches constitute an Advisory* Council on Workmen's Compensation Matters acting as a Subcommittee of the Council Committee on Workmen's Compensation. It is the hope of this Reference Committee that the basis of representation in the State Compensation Committee be broadened to include eventually all parts of New York State

Your Reference Committee recommends approval of this portion of the report, and I so move

DR. SAMUEL B BURK, *New York* I second it

There being no discussion the motion was put to a vote and unanimously carried

DR. HOLCOMB Regarding the matter of physicians' reports your Committee must emphasize the fact that physicians themselves are largely responsible for delayed payments to claimants and physicians due to their own negligence in filling out complete and prompt reports We again urge Society members to pay more attention to these matters

In reference to the question of better medical care for uninjured workers, we wish to emphasize the importance of providing these workers the best therapy that medicine affords. If a colleague in a given

specialty can be of assistance in any case in which the period of disability can be reduced or in which a better functional result can be obtained, then such assistance should be sought and extended to the worker Complaints by the employer, the claimant, the carrier, or the doctor in cases of delayed authorization or inadequate care should be referred to the compensation committee of the county society Prompt and adequate measures in rehabilitation after consultation with qualified specialists is urged in order to obtain maximum function in the injured worker This, together with an enlightened attitude on the part of the employers and carriers, should yield better and more prompt results

Your Reference Committee recommends approval of this portion of the report, and I so move

SECRETARY ANDERTON I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

DR HOLCOMB Your Reference Committee heartily approves of the paragraph on the proper administration, control, and inspection of medical bureaus The Compensation Committee of the component societies should be aware of both their duties and responsibilities in this matter (I think that has to do mostly with the metropolitan district)

Your Reference Committee recommends approval of this portion of the report, and I so move

DR ANDREW A EGGSTON, *Westchester* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

DR HOLCOMB Your Reference Committee again calls attention to the failure of recognition of the specialty of thoracic surgery We recommend that the chairman of the Workmen's Compensation Board be again urged to correct this situation and assign a rating of M-17 to this group of specialists in thoracic surgery

Your Reference Committee recommends approval of this portion of the report, and I so move

DR BENJAMIN M BERNSTEIN, *Kings* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

DR HOLCOMB As regards the fee schedule, your Reference Committee has reviewed and considered the vast amount of work done and energy expended by the Advisory Committee on Workmen's Compensation Fee Schedule which was appointed by the chairman of the Workmen's Compensation Board, Miss Donlon Forty-eight meetings have been held by this Committee, and the views of all interested groups have been evaluated The members of the State Medical Society owe a debt of gratitude to this Committee for their voluntary and unselfish work, and especially to the chairman, Dr Nathan B Van Etten, and their secretary, Dr Walter P Anderton We believe that the fees as promulgated on June 1, 1947, are inadequate in view of the present increased costs of living and of conducting medical practice We, therefore, recommend that the chairman of the Workmen's Compensation Board arrange for a yearly consideration and review of the fee schedule to bring it in line with the prevailing rates for medical service throughout the State of New York We also recommend that the chairman of the Workmen's Compensation Board, Miss Donlon, designate the fee schedule as a "minimum medical fee schedule" in accordance with the provisions of Section 13—Workmen's Compensation Law

Your Reference Committee recommends approval of this portion of the report, and I so move

DR SAMUEL B BURK, *New York* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

DR HOLCOMB In regard to the paragraph on Workmen's Compensation qualifications, we approve it in its entirety and call attention to the last sentence,

> "We urge the county societies to give even greater care to these functions so that the population may have full confidence that a physician is thoroughly competent once he has been so judged by the societies"

Your Reference Committee has reviewed the statements concerning the settlement of disputed medical bills in the four counties having a population of over one million We recommend that steps be taken to bring this procedure in line with the practice in vogue throughout the rest of the State where these disputed bills are arbitrated by a Committee consisting of five physicians

Your Reference Committee recommends approval of this portion of the report, and I so move

DR JOSEPH P HENRY, *Monroe* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

DR HOLCOMB Your Reference Committee reaffirms the principle that radiology, pathology, and anesthesiology and physical medicine constitute the practice of medicine and should be treated as such Concern is expressed that the continued exploitation by hospitals of physicians in these fields will result in discouraging men from entering and developing these specialties We also recommend that the Workmen's Compensation Law be so amended as to preclude the practice of medicine in any form by any agency other than a duly licensed physician

Your Reference Committee recommends approval of this portion of the report, and I so move

DR HARRY ARANOW, *Councilor* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

DR HOLCOMB Your Reference Committee has reviewed recommendations concerning legislation We urge that the recommendations of the Committee be carried out as embodied in this portion of the report

Your Reference Committee recommends approval of this portion of the report, and I so move

DR. REGINALD A HIGGONS, *Westchester* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

DR HOLCOMB In regard to public relations, your Reference Committee heartily endorses the further development of the cordial and cooperative relationship between the State Medical Society, the Workmen's Compensation Board, and all agencies which participate in compensation matters We feel, however, that this relationship with the Workmen's Compensation Board and the State Society has notably improved during the past year, and we look forward to a continuation of this policy

We wish to express appreciation to Dr Kenney for his advice and help in our deliberations, particularly are we in debt to Dr Kalish for his counsel and able assistance in the operation of the Workmen's Compensation Bureau of the New York State Medical Society

In conclusion, it must be remembered in negotiations in the field of Workmen s Compensation matters that there are five separate agencies or groups whose viewpoints and interests must be considered

1 The Workmen's Compensation Board which administers the Workmen s Compensation Laws as promulgated by the New York State Legislature

2 The employers' group, representing industries who pay the bills.

3. The members of the State Medical Society who render care to injured workers

4 The insurance carriers, who adjust and settle claims of all parties concerned.

5 The employe groups in the State, both organized and unorganized

All parties concerned are entitled to be heard Our Council Committee on Workmen's Compensation has spent countless hours and days in meetings to attempt to evaluate and reconcile the interests of all these groups Everyone realizes from the endless negotiations being conducted today in the world by industry and labor that solutions which are eminently and completely satisfactory to all parties concerned are difficult to achieve It must be kept in mind that the basis of successful negotiations must inevitably be some form of compromise which is just and fair to all concerned After all the ultimate goal is to afford the injured worker the best possible medical care. Your Reference Committee desires to commend the Council Committee for its untiring efforts in behalf of the State s physicians and their relationship to Workmen s Compensation.

I move the adoption of the report as a whole

Dr. Arthur A Fischl, *Queens* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Speaker Andresen Thank you Dr Holcomb

Dr. J Stanley Kenney *Councilor* I would merely like to have one minute, if I may, to express to the Reference Committee publicly our appreciation and thanks for their efficiency and painstaking action in getting this report through as they have done. They should be highly commended because they had a very difficult problem to resolve They had some very heated discussion and spent a long afternoon over this. I do feel as chairman of the Council Committee I would be remiss if I did not express my appreciation of their effort

The other matter that I would like to proclaim is to substantiate what Dr Holcomb has read you in regard to Miss Donlon s feeling about the work of the two gentlemen who represented this State Society on the Advisory Council in connection with the fee schedule She has told me time and again of the untiring efforts and unselfish devoton and counsel that both Dr Anderton and Dr Van Etten gave her and I wanted to express to this House her appreciation of the cooperation that they gave.

Thank you!

Speaker Andresen Thank you Dr Kenney!

Section 97 (*See 9*)

Report of Reference Committee on Report of Council, Part I: Postgraduate Education

Dr. W W Street *Onondaga* Mr Speaker and members of the House this is the Reference Committee s Report on Report of the Council, Part I Postgraduate Education.

Your reference committee wishes to commend most highly the work of the Council Committee on Public Health and Education for the high level of instruction and friendly cooperation which it has rendered to all of the county societies and other medical groups in response to their requests during the past year This program has been made available through the combined efforts of the faculties of the medical schools and research institutions of New York State, the New York State Department of Health, the Dental Society of the State of New York, the Division of Industrial Hygiene and Safety Standards of the New York State Department of Labor, the Medical Society of the State of New York, and other organizations.

The committee has prepared and distributed to all county society officers and many others a *Course Outline Book* which lists subjects and speakers available, with the additional notation that current revision of the list is in process and will be sent as soon as prepared. For those who desire subjects or speakers not listed in the outline, a request directly to the chairman of the committee often results in the matter being satisfactorily arranged

At a meeting on December 10, 1947, in New York City, the Council Committee on Public Health and Education while reviewing its activities of the preceding year, expressed to the State Department of Health the appreciation of the Medical Society of the State of New York for not only the cooperation of the Department in the development of the programs but also for the financial assistance received Your Reference Committee wishes to second this expression of appreciation most heartily

For the year May 1, 1947, to May 1 1948, the committee arranged for postgraduate instruction in 39 counties, with a total of 208 lectures, while in the preceding year it had arranged meetings in 38 counties, with a total of 174 lectures.

In addition to this activity regional meetings and teaching days were arranged in eight counties plus a teaching day on Tuesday May 18 in connection with this State Meeting

Your Reference Committee believes that this work of postgraduate education, which has been so ably arranged and performed by your Council Committee under the able and energetic leadership of Dr Mitchell is one of the very important services which the State Society renders to its component county units. It urges that every effort be made to aid the committee in the continuance of this work.

I move the approval of the report as a whole

Secretary Anderton I second the motion

There being no discussion the motion was put to a vote and was unanimously carried

Speaker Andresen Thank you, Dr Street!

Section 98

Report of the Reference Committee on Report of Council, Part III Industrial Health

Dr. Harry Golembe *Sullivan* Your Reference Committee on the Report of the Council Part III Public Health Activities (A) Industrial Health County Health Departments, Rural Medical Service begs to submit the following report

Industrial Health.—This Committee under the chairmanship of Dr Leon H Griggs, Syracuse, did not have a regular meeting during the year The chairman did participate in the Eighth Annual Congress on Industrial Health of the American Medical Association in Cleveland Ohio on January 5 and 6 1948.

It was felt at this conference that the leadership in this work should be centered in the Council of In-

dustrial Health of the Medical Association Accident prevention work is of such great importance that it is recommended that the Study Committee should be increased so that special attention can be given to this phase of Industrial Health Lectures relating to the Industrial Health Program continue to be arranged through the Committee on Public Health and Education, and it is hoped that more counties will avail themselves of these lectures Industrial Health Teaching Days were held only at one meeting in Troy, and it is recommended that efforts be made to extend this program to considerably more counties and districts The work of this Committee is commended and your Reference Committee recommends that this Committee be continued

I move the adoption of this portion of the report

DR WILLIAM B RAWLS, *New York* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 99

Report of the Reference Committee on Report of Council, Part III County Health Departments, Rural Medical Service

County Health Departments and Rural Medical Service—The report of your Committee on Rural Medical Service under the chairmanship of Dr Dan Mellen, of Rome, indicated that greater activities are expected in this field during the coming years, particularly in a cooperative program aimed to attract physicians, dentists, and nurses to the rural areas This program is receiving aid from the postgraduate departments of some of the medical colleges, and plans are now being formulated to extend medical service into the rural and district communities, your State Society is now handling requests from rural communities for physicians, some help in this work is being obtained from the Grange and the 4-H, and work has been started among interested parties and organizations to form a Health Council under the sponsorship of this Committee

It is hoped to have a further report on the progress of the Hill-Burton program It is important to note that in counties of less than 50,000 population, county health departments must be formed before State and Federal aid for hospital construction can be received through the Hill-Burton Program, and it is recommended that this Committee publicize this fact

I move the adoption of this section of the report

DR IRVINE E GAGE, *Albany* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

DR GOLEMBE It appears that prepaid medical care has not extended through the rural areas as rapidly as was hoped This appears to be due, in the main, to the fact that relatively few in the rural areas are engaged in industry, whereby hundreds of firms have paid for the entire cost of the hospital and surgical plan for all their employes and through payroll deduction have extended it to other members of their families and dependents It is recommended that the committee continue to study this problem so as to bring about a wider participation in prepaid medical service in the rural areas, and it is also recommended that the Committee investigate the possibilities of the State Society sponsoring a universal prepayment insurance plan so that the State can be covered as a whole, by one plan

I move the adoption of this portion of the report

DR ELTON R DICKSON, *Broome* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

DR GOLEMBE The activities of this Committee are commended, and your Reference Committee recommends that this Committee be continued

I move the adoption of this portion of the report

DR HARRY ARANOW, *Councilor* I second it

There being no discussion, the motion was put to a vote, and was unanimously carried

DR GOLEMBE Now I move the adoption of the report as a whole

DR STEPHEN R MONTEITH, *Rockland* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

Section 100 (Sec 50)

Report of Reference Committee on Report of Council, Part III Salary Scales for Public Health Physicians in the New York State Department of Health

DR HARRY GOLEMBE, *Sullivan* We have just one resolution that was referred to our Reference Committee That was the resolution introduced by Dr Henry E McGarvey, of Westchester County, pertaining to "Salary Scales for Public Health Physicians in the New York State Department of Health," reading

"WHEREAS, the health and welfare of the State of New York are dependent in many ways upon the satisfactory operation and performance of services provided through the New York State Department of Health, and

"WHEREAS, upon investigation it is evident that these services are suffering from a lack of essential medical personnel, and

"WHEREAS, the Commissioner of Health is handicapped in making replacements of highly important specialists because of inadequate salary scales, and

"WHEREAS, present available salaries for public health and laboratory physicians in the State Department of Health are not commensurate with incomes earned by physicians of like experience and training, and

"WHEREAS, 48 out of 96 full-time medical positions in the State Department of Health remain unfilled as a result of the low salary scales now in effect, and

"WHEREAS, important public health programs and necessary research cannot be carried on because of these conditions, and

"WHEREAS, these deficiencies threaten the health and welfare of the people of New York State, now therefore be it

"*Resolved*, that the Medical Society of the State of New York respectfully petition the Governor of New York to take prompt action to rectify this situation by means of

"1 Upward salary scale revision,

"2 The delegation of greater latitude to the Commissioner of Health to permit recruitment of personnel above salary scale minimums, and

"3 The simplification of Civil Service recruitment procedures as they pertain to medical personnel"

Your Committee approves every section of the resolution as reported, and hereby recommends that the Council be authorized to carry out the provisions herein contained

I move the adoption of this recommendation

DR. ELTON DICKSON *Broome* I second the motion.

There being no discussion, the motion was put to a vote and was unanimously carried.

SPEAKER ANDRESEN Thank you, Dr Golombo! We have not any more time this morning to discuss any more reference committee reports You have received the report of the Subcommittee on Cult Practices, which we ask you to study during your luncheon hour

Section 101

Authorizing Executive Session of the House of Delegates

DR. NELSON W STROHM *Vice-Speaker* I move that when the House of Delegates assembles in executive session this afternoon when it reconvenes at two o clock the reports of the Malpractice Insurance and Defense Board including that of the Actuary, Liaison Committee with the Veterans Administration, and the Subcommittee on Cult Practices be discussed thereat.

DR. EZRA A. WOLFF *Queens* I should like to second that.

There being no discussion the motion was put to a vote and was unanimously carried

SPEAKER ANDRESEN None will be admitted but members of the House, Executive State Secretary Executive State Officer Administrative Assistant Executive Secretaries of component county societies, Insurance representatives counsel auditor stenotypist, members of the Malpractice Insurance and Defense Board, and the chairmen of any Economics Committees of any county societies who may be present

Has anybody present any other suggestions for any further people who should be added?

DR WOLFF May I add the presidents of the county medical societies who may be present?

SPEAKER ANDRESEN Is there any objection to adding the presidents of such county medical societies as may be present?

There was no dissent expressed

SPEAKER ANDRESEN Really the county medical societies ought to elect their presidents members of their delegation

DR. WOLFF *Tell that to the county societies*

DR. HOMER J KNICKERBOCKER, *Ontario* We have with us a distinguished member of the Indian Medical Association Dr Sen I would move that he be permitted also to attend He is here for the purpose of observing our conduct and methods

DR. SAMUEL B BURK I second that

There being no discussion the motion was put to a vote and was unanimously carried

SPEAKER ANDRESEN Is there any objection to the list that I read of those who will be admitted to the Executive Session this afternoon?

There was no dissent expressed.

SPEAKER ANDRESEN We will now recess until two o clock sharp Dr Strohm will be chairman of the Committee of the Whole

At 1·05 P M., a recess was taken

Afternoon Session

May 18 1948

The House met in Executive Session at 2 o clock pursuant to recess.

SPEAKER ANDRESEN The meeting will come to order, please

At the meeting this morning I neglected to announce who the sergeants-at-arms are going to be Dr Dan Mellen of Rome is the Chief Sergeant at Arms, and Dr Wood of Kings and Dr Kircher of Albany are his assistants

I will now turn the meeting over to Dr Strohm, who will act as chairman of the Committee of the Whole sitting in executive session

DR JAMES F REULING, *Treasurer* There is in the House a former member of the Council and a former Trustee of this Society Dr John Bauer of Brooklyn. I move, sir that he be given the privilege of attending this executive session.

DR. SAMUEL B BURK, *New York* I second it

There being no discussion the motion was put to a vote and was unanimously carried

DR. REULING I would also like to move that the accredited delegates from our border states be given the privilege of attending this House during the executive session

DR. THOMAS M D ANGELO *Queens* I second the motion.

There being no discussion the motion was put to a vote and was unanimously carried

SPEAKER ANDRESEN The gentlemen named are invited to remain I will now introduce Dr Strohm chairman of the Committee of the Whole

VICE-SPEAKER STROHM Will Dr Mellon report as Sergeant-at-Arms? Is everybody in the room entitled to be here?

DR. DAN MELLEN *Councilor* Yes, sir this House is in order now for executive session.

VICE-SPEAKER STROHM I now declare the House of Delegates of the Medical Society of the State of New York in executive session

Section 102 (*See 23 30*)

Report of Reference Committee on Report of Malpractice Insurance and Defense Board

VICE-SPEAKER STROHM The first subject to be discussed is Malpractice Insurance and Defense Board Dr Koplowitz is the chairman of that Reference Committee

DR. ABRAHAM KOPLOWITZ, *Kings* Mr Speaker and members of the House I heard a very nice introduction this morning by Dr Di Natale thanking the members of his Committee. I want to take this opportunity to thank the members of my committee Dr Daisy H. Van Dyke Dr Harry S. Fish Dr Henry E McGarvey and Dr Harold B David son. I don t know how usual it is to have such harmony but it was excellent Your Reference Committee has made whatever efforts it could to study the report and get whatever information they could to help

To begin with your Reference Committee on the Report of the Malpractice Insurance and Defense Board has given the report the careful study it merits, and with due attention to the facts stated, we have especially concerned ourselves with the recommendations made

The Group Plan of Malpractice Insurance and *Defense has caused much debate and discussion* which at times, became acrimonious in several recent meetings of the House of Delegates. In all of these discussions your Committee feels that the

opinions expressed, whether right or wrong, were honestly intended, but certain fundamental points, which should be accepted as basic in any consideration of this subject, seem to have been overlooked or disregarded These are

First That the facts and figures, as presented by the Malpractice Insurance and Defense Board, be accepted as correct

Second That the members of the Board, appointed by the House of Delegates to have charge of and supervise the operation of the Group Plan, are hardworking, honest, and loyal members of our Society who are unselfishly and unstintingly giving of their time and energy in our service

Without the acceptance of these two premises, we shall have to start again where we were in 1921

The situation in the entire insurance field, as described in the report, is a well-known fact, and we must form our judgments in accordance with it

The report informs us that, in spite of the increase in the base rate early in 1947, after six months' experience the Yorkshire asked leave to withdraw from the field of malpractice insurance That fact requires some serious thought on our part because insurance companies do not retire from a field in which they have a reasonable prospect of profit

Your Committee wonders how many members of our Society are sufficiently acquainted with our Group Plan to understand the significance of the conditions which the Society demands of our insurance carrier Time does not permit a full description of them, but they are all set forth in a little booklet on the Group Plan of Malpractice Insurance and Defense, which was published by the Society in 1945 and distributed to all members at that time Additional copies can easily be obtained by application to the secretary of your county society Suffice it to say that more than a quarter of a century ago, some of our best minds, with the best advice obtainable, formulated the plans for our group insurance which is unique in the insurance business, particularly in the safeguards it provides for the members who seek protection under it These have not left rates and conditions of insurance to the whims or selfish interests of the insurance carriers but have controlled and made them flexible to accord with our loss ratios and changing conditions of the times as they arose In addition, they have assured our members the best and most expert legal defense counsel obtainable—thoroughly experienced and chosen by us

In the event of a suit against one of our members, not only is his pocketbook attacked, but what is more important, his professional reputation is put in jeopardy In these circumstances, surely only the best legal defense will do, supplemented by reliable protection against financial loss

The report informs us of the differential in rates which it has been necessary to create between the two parts of the State This, we feel sure, will arouse a good deal of criticism, and yet, those of us in the metropolitan area who carry automobile insurance know that members living twenty miles outside the metropolitan area get their insurance much cheaper It is the same with burglary and many other forms of insurance

It is a fact that, in view of the great difference in the number and cost of malpractice actions between the two sections of the State, the upstate members have been carrying a good deal more of the burden than they have been entitled to The Yorkshire now demands that a corresponding differential in rates be adopted to make the plan work equitably and to make it possible for the company to continue to carry our business Your committee is informed that the independent actuaries, under employment of the Society, have recently completed a study of the Group Plan and have concurred in the necessity for this differential

Finally, it should be noted that the Group Plan is not under the corporate ownership of the Society Although the Society has a great and unusual degree of control over certain details of the plan, in the final analysis, it is, and can only be, the liability of the company which carries it, and their interests must have equal consideration with those of the Society

The Yorkshire Indemnity Company has carried our insurance for twelve years It is as well managed a company as exists in the field and, if they have sought to be relieved of our business unless certain, necessary conditions were met, it behooves us to appraise our position carefully before we decide anything Particularly, we should have in mind that our loss experience, checked and verified by independent actuaries, provides no grounds for the belief that it would be any more favorable in any other company The losses, which control our rates, are not caused by the company which carries our Group Plan but by us who are insured under it

Other reliable companies have been contacted, and all of them have refused to consider our business under the terms and requirements laid down by our Society for the Group Plan The chairman of your reference committee contacted his own insurance broker, who is about the average that most of us deal with He was asked to secure a malpractice policy for me, but, after two days of effort, he reported no success All of the companies refused to write such a policy, but some of them referred him to the Yorkshire

The reason for the continuous increase in the number of suits and claims can, in a large measure, be laid at our door Too many doctors are careless and rely upon insurance to make good their mistakes Too many physicians are prone, unethically and unfairly, to criticize the next fellow Of course, this does not apply to the great bulk of our membership, but all of us must pay for it

We are informed by the Malpractice Insurance and Defense Board that they have been in contact with the American Policyholders Insurance Company, but they have been unable to get from a responsible officer of the company proposals for underwriting the Group Plan which could be approved and recommended to the Society (You heard yesterday a supplementary report, which is practically only for information stating these facts) This was reported to the House of Delegates in 1945, and recent contact with local representative of the company indicated that there has been no change in the situation

Some members of your reference committee have also been approached by that company, and we realize the temptation to buy something cheaper, but the question is Is it cheaper? In such a company, would we have the same protection and defense service, or would we lose ourselves in the morass of small print and be rudely awakened when in distress to the fact that some little clause we had overlooked, but ruthlessly enforced by the company, had deprived us of protection when needed most, like the member whose case is referred to in Section 4 of the Board's report?

Writing policies for individual members or even in a group form, on the company's own terms, would leave us at the mercy of that company as soon as the controls and safeguards provided in our setup were

abolished and the carrier of the Group Plan were forced out of the picture. It is only simple logic that, if our loss ratio continues or even approximates our present level such a company, with no binding agreement to limit and control their ratio changes, would charge us rates which would make those we have at present look small indeed

The Yorkshire Indemnity Company has faithfully discharged its obligations to us in the face of a huge deficit for them from our business Can we expect that any other company, without the help of our splendid proved legal staff, will do better? Even if we forgot our moral obligations to the company which has, so honorably, borne our losses, we would be foolish indeed to abandon the safeguards which have been established for our protection and which have served us so well, to gamble with any company which will not bind itself to the basic requirements adopted by this House

When we have to pay $35 for only $1 000 floater insurance for our personal baggage losses our present rates for $5,000 malpractice insurance protection do not seem very high.

The Board recommends that it be authorized to deny further insurance to members guilty of acts for which no reasonable excuse can be found, provided that such members may appeal to the Council if they so desire. We feel that our membership should do its part in helping to combat the growing seriousness of this situation and help to preserve our well tried Group Plan

For your information I want to cite four cases that have been taken from our records as an example of the type of cases referred to These should open our eyes to what can and does happen

1 During an attempted hysterectomy a surgeon failed to control so many bleeding vessels that the intern called another surgeon, who by chance was in the hospital, to save the life of the patient The second surgeon was so impressed with the inefficiency of the man who undertook the operation, that he summarily ordered him out of the operating room

2 A doctor attempting an extensive removal of a cyst on the inside of a boy's knee severed a main nerve, causing a dropping of the foot which went undetected for two months. Upon admission to a neurologic institute a 2-inch separation of the nerve was discovered, and the boy is crippled for life.

3 A physician was responsible for the death of a child to whom he gave a full dose of tetanus antitoxin without first giving a mandatory skin test. When confronted with this fact the doctor said "I never bother about that. '

4. A doctor placed both hands of a young woman under x ray for treatment, and shortly afterwards went home, having forgotten his patient An hour and a half later the attendant nurse shut off the x ray machine and reported to the doctor that she had done so

Your Reference Committee feels that this recommendation about refusing insurance to doctors who cannot give any reasonable human excuse for their misconduct should be approved, and I so move

DR. HOMER J KNICKERBOCKER *Ontario* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried.

DR. KOPLOWITZ In respect to the actuarial report by actuaries Wolfe, Corcoran and Linder, which was handed to us, and which is far beyond the scope of any of us doctors to analyze I want to ask the privilege of having one of the actuaries Mr Linder who is here, give us his summary of the report in much more detail than we could in our report.

VICE-SPEAKER STROHM It is granted Mr Linder!

MR. JOSEPH LINDER Mr Speaker, Ladies and Gentlemen, acting upon the instructions of your Society, we have recently completed an audit and actuarial study of your Group Plan of Malpractice Insurance and Defense, the report thereon having been filed with your Secretary In undertaking this work, we agreed to summarize and explain our report at this meeting

Our work was greatly facilitated by the complete and accurate records maintained for the Society by your Indemnity Representative The analyzed reports which he has furnished to the Society each year are referred to in our report and in this discussion as the *Statistical Data* Necessarily, much of our report is of a technical nature which cannot be explained to good advantage in a meeting of this size However I shall try, in as nontechnical terms as possible, to explain the significance of our findings and conclusions in a way that may be helpful to you

In a study of this character, it is assumed that the Society is interested in knowing

(*a*) Whether or not the records maintained by your representative and, therefore, the information furnished to the Society are complete and correct,

(*b*) Whether or not the rates have been correctly calculated and whether the operation has been profitable or unprofitable,

(*c*) What recommendations we can make to improve the operation of the Group Plan, together with any other comments which may be helpful to every one concerned

From an auditing standpoint, we found the accounts complete and correct, assuming that the audit made last year was correct as to the paid vouchers and premiums collected for the years 1936 to 1946 inclusive During the course of our audit, it was noted that the method used in accounting for exposures on delayed writings and cancellations did not follow approved practice However, it is believed that the influence of this departure from approved practice, with groupings of three- to five-year periods, is so small as to be negligible Accordingly we have assumed that the recorded exposures, for the purpose of our study and report are correct.

In our report, we have taken exception to the method used to determine current rates. Under the system used, these have been obtained from year to year by an annual review of the entire loss experience from 1936, when the present insurance carrier undertook the Group Plan down to and including the last calendar year While the entire loss experience should be utilized selectively for statistical indications, such as the number and ratio of claims to exposures, average settlement costs, etc. it seems to us that rate determinations should be made on more current experience as, for example the latest three or five policy years. Under ordinary circumstances, we would suggest the latest three policy years but, because the lag in reporting or settlement of losses is greater in malpractice insurance than in any other form of liability insurance with which we are familiar we believe that the latest five policy years should be used By the latest five policy years, we mean the latest five *expired* policy years. For example as of December 31, 1947 the latest five expired policy years would consist of the years 1942 to 1946, inclusive The policy year 1947 is omitted because the certificates issued during 1947 will not be fully expired until the end of 1948

The total loss experience is composed of the closed cases, the cost of which is known, plus reserves for outstanding cases and those which are as yet, un

reported In both of the latter groups the ultimate cost is unknown and, therefore, has to be estimated It follows, therefore, that the accuracy of the total will depend upon the accuracy with which these estimates are made Also, since these reserves are matters of estimates, it follows that the smaller the estimates are in relation to the total losses incurred, the more accurate will be the latter figure In our report, this is illustrated by examples which compare the constituent portions of losses incurred for the last five expired policy years with those for the last five policy years, as obtained from the standard limit section of Exhibit A of our report This shows that by using the last five expired policy years, the cost of closed cases, which is the known factor, represents 45 per cent of the total, whereas, by using the last five policy years this known factor represents only 29 2 per cent of the total Thus, aside from other considerations, it would appear to be highly desirable to omit from rate calculations the unexpired policy year which will always be the last calendar year of the period From the standpoint of both the insurance carrier and the members, we believe that modification of the rating formula in this regard would work out more satisfactorily than the present practice

After considerable experimentation with the data shown in Exhibit B of our report, we were unable to evolve any method which, if consistently applied, would have predicted with any greater degree of accuracy the total number of unreported cases as of the end of each of the years 1942 through 1946, if the unexpired policy year had been included Accordingly, we have also used the latest five expired policy years in determining the number of unreported suits and claims

That the method heretofore used did not predict a sufficient number of cases to arise appears to have been realized when the *Statistical Data* was compiled at the end of 1947 Although the method followed was the same as in previous years, there was introduced for the first time a trend factor based upon a comparison of the number of cases predicted with those actually reported during four of the preceding years Had the method we now recommend been used, it probably would not have been necessary to apply a trend factor

Except for the omission of the unexpired year of 1947, our calculation of the number of cases to arise, the details of which are given in Exhibit C of our report, closely parallels that utilized in compiling the *Statistical Data* as of December 31, 1947

Having arrived at the number of suits and claims expected to arise, it was necessary to ascertain the average cost of recent cases to obtain the probable cost of those to arise After extensive analysis, we concluded that the average cost of actions closed by year of settlement offered the best method of estimating the cost of factor Accordingly, we used the average costs for the last five years, including 1947, in order to utilize the latest figures obtainable This is shown in Exhibit D of our report

The reserves for outstanding suits and claims are established, primarily, by agreement between the legal counsel for the Society and the insurance carrier, and these are revised several times each year to make them as realistic as possible When taken into the *Statistical Data*, the total estimates for these cases are modified by a factor for probable salvage derived from comparison of the cost of closed cases with the reserves established for them As in the case of other elements of the *Statistical Data* these factors were determined by using the figures for the entire period since 1936 It seemed to us that it would be better to develop probable salvage factors from more recent experience Accordingly, those developed by us, as shown in Exhibit E of our report, were based upon the cases closed during the last five years While the method used by us appears preferable, the factors produced by our method do not differ substantially from those derived from the *Statistical Data*

Having obtained the loss experience for the selected period under what we believe to be sound actuarial methods, we were then in a position to compute the pure premiums and rates and to test those reported to the Society, as derived from the *Statistical Data* These are discussed at length in our report, but, for the purpose of this presentation, it will suffice to report that our calculation, based upon the 66 per cent agreed loss ratio, shows the following minimum rate requirements metropolitan area, $44 58, upstate area $24 42, State average, $38 21

The State average rate is $3 80 higher than that computed by your Indemnity Representative in the *Statistical Data* and $3 68 less than the current rates in use Considering the difference in the time periods used and the method employed, these results are surprisingly close, varying from each other by approximately 10 per cent It must be kept in mind, however, that the rates computed by us make no provision for the amortization of any accumulated deficit

The problem of determining the adequacy of the percentages charged for excess limits, that is, those in excess of the standard limits of $5 per 15,000, is rather a difficult one since it cannot be approached by the same statistical method as that used for standard limits Wide fluctuation in the loss ratios for excess limits were noted, varying from 11 per cent for policy year 1938 to 102 7 per cent for policy year 1945 The only test which can be applied to this element of the business is whether or not the excess limit rates are reasonable To test this, we made a computation of the excess loss ratio using our time period of the latest five expired policy years, and, oddly enough, we found that it was 66 per cent, which is exactly the same as the agreed loss ratio for standard limits If this ratio is considered reasonable for standard limits, it cannot be considered unreasonable for excess limits

The Group Plan is based upon a cost-plus agreement whereby the base rates for standard limits are determined from the cost of losses up to $5 per 15,000, loaded by 34 per cent for expenses and profit The question naturally arises as to whether this expense and profit loading is reasonable In our opinion, the loading factor of 34 per cent is entirely reasonable for agency insurance companies It must be kept in mind that this includes the profit ratio of 2 5 per cent to which the company is limited If this insurance were purchased from a direct writing company, that is, one which deals directly with the insurance buyers, it might be possible to save a few points on the expenses As an offset to this possible saving, however, the members would be obliged to deal, as individuals, directly with the company, and the Society would have to assume the cost of whatever insurance representation it desired to maintain

From our study, it appears that the members of the Society have secured their protection, throughout the period, for less than a fair rate This has resulted in a substantial loss to the insurance carrier In our opinion, a large portion of this loss was caused

by the fundamental error in the rating formula. We believe that, if our formula had been used each year since 1936 the accumulated loss, if any would have been of modest proportions

Because after many years, a differential in rates for the two parts of the State has recently been introduced, we feel that this innovation should have some comment In its simplest form, a group plan provides a *uniform rate for uniform coverage, the over* all or average rate being calculated with due regard for a diversity of hazards, such as, age, occupations etc , when these are grouped together in a heterogeneous mass. So far as geographic differentials are concerned, there is a sound underwriting reason for a distinction in rates, particularly where, as in the case of the Group Plan there is a wide difference in cost between two clearly defined areas. In a situation of that kind, an average state-wide rate does not appear to be appropriate For that reason, it is our opinion that the geographic differential should have been adopted at a much earlier date

As a result of our study, we have the following three recommendations to make

1. That the present system of accounting for all delayed writings and cancellations in the calendar year in which they occur be changed so as to account for them in the policy year to which they properly belong

2 That the rating formula be changed to include the latest five *expired* policy years as a basis for determining future rate changes

3 Assuming that the Society recognizes its obligation to the carrying company for the loss which has accrued, that some further study be given to the best method of amortizing that loss

It is a known fact in casualty insurance that more companies have been in and out of the malpractice insurance business than has been the case in almost any other form of liability insurance It is a difficult form of insurance to write, and so far as we know it has seldom proved satisfactory to any company The inordinate lag in the reporting and disposing of actions against doctors makes the loss experience look favorable during the early years of writing Later when the companies learn the actual cost of the business there is a rude awakening When that occurs, the companies are forced to seek greatly increased rates or to withdraw from the business frequently the latter It is not unknown in the past when companies have withdrawn from the field that many doctors most of whom have never had a claim suddenly find themselves unable to purchase insurance except at what they felt were exorbitant rates. Because of the unsatisfactory nature of this business, as near as we can ascertain, it is being written in small volume by a very limited number of companies.

We feel that the Society is to be congratulated upon the earnest effort it is making to solve this difficult problem for itself The Group Plan is soundly conceived and well managed In our opinion, the Group Plan can be successfully operated in the future on a basis mutually profitable to the members of the Society and the carrying company if the recommendations we have made are put into effect.

The Group Plan is almost unique in that the carrier has delegated a large measure of control over its business to the Society However this places upon the Society a heavy burden to insure that the interests of both sides are fairly represented. Whether or not this system results in decreased loss costs it is impossible to state, but it does insure the members against paying more for their insurance than it reasonably costs Furthermore, and possibly more important it assures that the professional interests of the members will always have consideration in the handling of claims against them.

The foregoing I think, fully answers the points of chief interest to the Society Thank you. (*Applause*)

DR. KOPLOWITZ Mr Speaker, would it be your wisdom to permit any questions to be asked of Mr Linder?

VICE-SPEAKER STROHM Yes I think that would be perfectly in order

Are there any questions of the actuary Mr Linder?

There was no response

VICE-SPEAKER STROHM If not thank you (*Applause*)

DR. KOPLOWITZ Mr Speaker to finish the report, the entire report seems to us to be a well rounded summary of our situation It is the result of painstaking conscientious and tireless energy that presents a sound attitude which the Society should adopt with respect to our malpractice insurance and defense program

We recommend that the Malpractice Insurance and Defense Board be empowered to continue the Group Plan on Malpractice Insurance which the Society has so successfully used up to the present time.

The Supplementary Report of the Committee on Malpractice Insurance and Defense concerning the American Policyholders Insurance Company was for information only

I move the adoption of this report as a whole.

DR. HAROLD B DAVIDSON *New York* I second the motion

There being no discussion the motion was put to a vote and was unanimously carried.

Section 103 (*See 65*)

Report of Reference Committee on Report of Malpractice Insurance and Defense Board Malpractice Insurance and Public Relations

DR. ABRAHAM KOPLOWITZ, *Kings* We have had a resolution referred to us introduced by Dr Frederick S Wetherell, of Onondaga County

'WHEREAS, it is apparent that the cost of malpractice insurance is constantly increasing and

WHEREAS, everything that might cause a malpractice claim is a source of bad public relations, and

'WHEREAS, the elimination of these causes serves also to eliminate one category of causes of bad public relations and

WHEREAS among these causes are Injury to a patient through negligence or ineptitude criticism of a colleague s work, made to a patient by another physician abandonment of the patient failure to treat each patient with meticulous attention to the requirements of good medical practice using undue optimism in prognosis, failure to give the patient a clear understanding of the diagnosis or treatment and

'WHEREAS it has been proven that removal of these causes by the institution of a militant public relations program has resulted in the practical elimination of malpractice suits and

'WHEREAS the Alameda County California, Medical Society has instituted a plan of medical public relations which has resulted in eliminating malpractice suits for the past two years, be it

Resolved that the Council of the Medical So-

ciety of the State of New York be instructed to study the Alameda County Plan, and as soon as feasible to institute procedures which will end in the employment of measures of like nature in the constituent county societies or district branches of the Medical Society of the State of New York."

Your Reference Committee has studied the resolution introduced by Dr F S Wetherell, concerning the study by the Malpractice Insurance and Defense Board of the Alameda County Plan on Public Relations and such other plans as may be helpful, and which are being used in other states and counties, and thinks it is a very wise one The Reference Committee feels that it may be useful to have such a study conducted in our public relations as affecting our insurance plan We, therefore, move the adoption of this resolution, and I so move

DR HAROLD B DAVIDSON, *New York* I second the motion

VICE-SPEAKER STROHM It has been duly moved and seconded that the resolution be adopted Is there any discussion?

DR THOMAS M D'ANGELO, *Queens* Mr Speaker and members of the House of Delegates, your Malpractice Insurance and Defense Board greatly wants to undertake this study Had it not been for the tremendous amount of work and detail that had been thrust upon your Board during the current year, with which you have undoubtedly become familiar by this time through our report and through the report of the Reference Committee, this study would have undoubtedly been undertaken long ago I had in mind as soon as assuming the chairmanship of the Board to make such a study, especially in our neighboring state of New Jersey, which handles this on a state plan, and in our neighboring state of Connecticut which handles this on a county plan, but your chairman and your board have have not found time this year to do that We welcome the opportunity this year to conduct such a study, and to do everything in every way possible to lessen the losses that our Malpractice Insurance Plan has had up to this time The Chairman of your Board endorses this resolution

The question was called, and the motion was put to a vote and was unanimously carried

VICE-SPEAKER STROHM Thank you! The entire report has been adopted

Section 104

Report of the Liaison Committee with The Veterans Administration

VICE-SPEAKER STROHM The next order of business is discussion of the Veterans Administration matter, which will be opened by Dr Bauckus

DR HERBERT H BAUCKUS, *Past-President* Mr Speaker, Ladies and Gentlemen of the House, I am reporting to you as chairman of your Liaison Committee with the Veterans Administration I am also the President of the Veterans Medical Service Plan of New York, Inc That Plan is a separate body, it is an independent organization, but of course it has its parentage in the Medical Society of the State of New York

Some of you heard this morning that we are going to have some resolutions acted upon by the Reference Committee, and they will be presented for your consideration later on They are largely the outgrowth of our experience in this Plan during the last two years

We began in September, 1946, to work under the Home Town Medical Care Program I would like to report to you a meeting that a committee of the American Medical Association, of which I am chairman, had with Dr Magnuson in Washington some ten days ago, the first meeting we had with him since he had become director, and also a meeting we had on that same date with the American Hospital Association I think you need to know about this because it may be up to you, and I think should be up to you, to decide what kind of a contract, if any, the Veterans Medical Service Plan shall make with the Veterans Administration for the next year The time for that is before August 7, 1948

I would like to quote one or two figures, although I know you are not desirous of hearing many of those In the metropolitan area, the five counties of Greater New York and a certain number of counties outside them, in April, 1947, for the pay of physicians on the fee basis the amount of money was $239,364, in October, 1947, the amount was $149,060, in the next month it was $65,000, and in the month of December, 1947, it was $29,481, and in April of 1948 it was $17,955 That decline from $239,000 to—by the way the lowest figure was in March, 1948—$13,000 in this metropolitan area was greater than in the other branches of the State, nevertheless, it is a fair indication of the changes that have taken place in this kind of service

I think we should have a little review of the history of this Plan, the general plan, which was first adopted by the American Medical Association and then by various states of the United States

Point Seven of the Ten Point National Health Program of the American Medical Association is captioned "Veterans' Needs for Hospital and Medical Care" It begins thus "A program for national health should include the administration of medical care, including hospitalization, to all veterans, such medical care to be provided preferably by a physician of the veteran's choice, with payment by the Veterans Administration through a plan mutually agreed upon between the state medical association and the Veterans Administration"

The American Medical Association has given sincere and active support to this objective It arranged numerous study conferences, and it urged its state medical associations to implement active programs in each state In November, 1947, the American Medical Association sponsored a National Conference on the Veterans Administration Home Town Medical Care Program

The Veterans Administration found, soon after the close of the active wars with Hitler and Japan, that its need of facilities and its financial resources for medical and hospital care for veterans had been grossly underestimated Since 1945, the organizations of medicine, county, state, and national, have been in active endeavor with our government officials to restore the health and prolong the life of the veteran, especially in that group suffering from service-connected disability or disease

The Chief Medical Director of the Veterans Administration appeared before the House of Delegates of the American Medical Association and frankly stated that the colossal task of providing needed medical care to the great group of returning veterans could by no means be cared for in the Veterans Administration alone He pleaded for the cooperation of the profession and asked that state societies arrange to make contracts with the Veterans Administration to give service on a fee basis system He stated that as much use as possible would be made of existing Veterans Administration facilities, but that a great deal of the service-connected dis-

ability and disease would need to be handled by out side care. He stated that he believed that as far as possible this additional service should be rendered on the private practice methods in vogue with the American profession, and that in conformation with this principle a free choice of personal physician should be available to the veteran He expressed the hope that the program would be greatly im proved over the methods formerly existing in Vet erans Administration care, a point of much interest to the profession at that time because there had been severe criticism of previous medical service in this branch of the government

The Director emphasized the need for immediate action. He pointed out that in no way was the serv ice-connected case one of welfare or charity but that it was a direct and definite obligation of the United States Government to give the veteran the benefit of the highest quality medical service avail able in this country He asked for the cooperation of the medical profession to make this possible Reference was made that, although the teaching of medicine in the hospital was consistent with the high standards of care nevertheless, the first considera tion was not the use of the veterans as teaching ma terial. The slogan, "Highest Standards of Medical and Hospital Care," became a feature of the earlier discussions on veterans' medical services and formed a sound reason for general public approval of the Home Town Medical Care Program. The theme 'Medical Care Second to None' appealed to all

The Director stated that he realized the achieve ment of providing the highest kind of service to the veteran would demand adequate payment for serv ices so that we could reasonably ask any skillful and experienced physician to participate in the pro gram He wanted the government protected as to costs and merely asked that the fee schedule be no more nor less than that regularly prevailing in the community in question. He said that, although we were venturing upon a new and gigantic program with little preparation, it appeared to him that we should ask the various state societies to make con tracts with the Veterans Administration so they would act as a unit for care in a given state The contract would of course outline more detailed plans including the adoption of a state fee schedule. He urged the early enactment of actual care in the Home Town Medical Care Program.

To this laudable and scholarly outline of the vet erans health program the House of Delegates of the American Medical Association gave spontaneous and wholehearted approval. The event was followed by sympathetic general support of the state and county medical societies. Committees on veterans' medical and hospital care were formed, and by the summer and fall of 1946 the program was actively under way

There was genuine admiration and respect for General Hawley in his stand for the acknowledged best methods inherent in the American system of medical care To this day the great majority of the medical profession sincerely regrets the Director s departure from the service, and it has high hopes that his successors will continue to uphold the ideals of the practice of medicine

There were misgivings as to the ultimate outcome of the private care program by some physicians It is to the credit of the profession that it brushed aside some serious doubts of the outcome of these new projects in order to rally to the demand for prac tical care. It knew it had the answer and success would attend if it were allowed to proceed. Besides many of the physicians were veterans and had the sympathetic understanding so necessary to combat the many problems

It may be well to review briefly some of the objec tions. I enumerate a few of them

1 The program although at first ideal might be changed by some of those in authority so that it would later tend to the socialization of medicine There was the fear that the services provided would be extended to members of the veteran s family hav ing no military service or even to the general popula tion It was realized that such an extension would not only lead to a drastic lowering of standards, but that it would be quite impossible with the limited professional personnel in this country The realiza tion that such a final extensive program would be far too costly for the American taxpayer would come later on

I have no doubt that there were and are, many who hopefully looked forward to a socialization of medicine program comparable to compulsory sick ness insurance From my experience in my own State of New York I feel that some physicians, in cluding quite a few in the Veterans Administration in that State looking forward to the dissolution of the personal care thoels, have, by word and deed not only sought the return to the old bureaucrat system but the inauguration of more and more socialization features Some of them in my opinion envision the success of legislation of the Wagner Murray Dingell type enhanced by misdirection of our well-intentioned and simple desire to assist in a medical crisis

2. The fear that so-called government red tape would irk and confuse the veteran and the physician.

3 The fear that political interference and mis understanding could corrupt the program

4. The impression that such a quickly organized gigantic nation wide program would present many administrative difficulties which could result in dam age to the reputation of the American practitioner of medicine

No one seriously pressed the embarrassing ques tion of why these preparations had been made so late at least two or three years too late Concern was expressed over the future building of many new hospitals whose beds were needed now It would take a few years to build these hospitals, and some of them are to be under construction until at least 1951

At this point I might say that a committee of the American Medical Association met at the invitation of the American Hospital Association with a com mittee of that latter Association which meeting was attended by the President and many of the top offi cials of the American Hospital Association, and they had a several hour discussion with us on this subject in which they presented in no uncertain terms their criticism of the Veterans Hospital Program I may appear to be rather critical but they published this pamphlet *Federal Hospital Planning With Par ticular Reference to Care for Veterans* They have a new paper known as *The Position of the American Hospital Association on Veterans Hospitals.* They presented other papers which I have here on the subject. They are I would say bitterly op posed to much of the program in present-day veteran hospital administration and also that relating to fu ture construction.

There are many interesting items to be observed on this question of new hospital construction We are having two systems of hospital construction fostered by the Federal Government We have the Hospital Survey and Construction Act, passed by

Congress, which will result in the construction of new hospitals and public health centers throughout the country This Act under the Hill-Burton Bill provides integrated planning for construction of nonfederal hospitals, with guidance at the Federal level and major planning on a state basis According to a recent publication of the American Hospital Association, Congress has currently appropriated $772,702,814 for expansion of veterans' hospitals The Hospital Survey and Construction Act authorizes Federal assistance to the states in the amount of $75,000,000 a year, over a five-year period (not yet appropriated) On the basis of two-thirds matching of local funds there would result a total nonfederal hospital construction program of $1,125,000,000 in five years if Congress appropriates funds to the extent authorized In emphasizing the arguments for the desirability of over-all planning in the expenditure of Federal funds for hospital construction so that the system may serve not only veterans but their families and the balance of the population as well, this publication of the American Hospital Association states "Had there been satisfactory planning at an early period, tremendous sums invested in Veterans Administration hospitals and in the care of veterans might have been utilized for this purpose through a grants-in-aid program to the states, with standards of care and eligibility of veterans controlled by the Federal Government"

We expect 150,000 beds in Veterans Administration hospitals by 1951 In a release of statistics by the Veterans Administration of veterans awaiting admission to hospitals as of October 15, 1947, there were 16,917 nonservice-connected cases awaiting hospitalization, and of these 11,568 had been waiting over forty days

This is startling information and requires further consideration It should be pointed out that we are now speaking of nonservice-connected cases The nonservice-connected applicant in making application for entrance to a veterans' hospital must declare that he is not financially able to pay the necessary expenses of hospital or domiciliary care He does that by filling out an application which states "Application for Hospital Treatment or Domiciliary Care" and answers yes or no to the question, "Are you financially able to pay the necessary expenses of hospital or domiciliary care?" If he writes, "No," that is all there is to it The legislation provides that no question shall be made of the veteran's statement, nor have there ever been to our knowledge any investigations of that If this requirement were carefully observed, or if there were some income bracket qualification, the more needy veterans could be granted the hospitalization often urgently needed in this class Next to the service-connected case, this economic group should have the first consideration A more realistic adherence to the requirement would eliminate the tendency to "boarding" in some instances If beds for these cases are not available in Veterans Administration hospitals, it would appear that provision should be made in the local private or community hospital The Hill-Burton program is designed to provide additional beds in localities where needed

There is another reason for the 11,586 veterans awaiting hospitalization over forty days It is that of the policy in force for the service-connected disease or disability The fee basis or Home Town Care Program is limited to the service-connected disease or disability However, in the past year, hospitalization in private hospitals has been denied the veteran except in acute emergency and in the case of women

I might say that was the first start in the change of our Home Town Program The first thing that happened to interfere with it seriously was the refusal to provide local hospital care, which meant that there was very little free choice of physician in the case of surgery and any case requiring hospitalization

If the service-connected case were handled under our local care, including home community hospitalization, there would be beds for the needy nonservice-connected case It is unfair to the surgical cases to deny them the same kind of care available to the medical cases and works an additional hardship to the veteran and to his visiting family if he must travel to a distant hospital If it is the intention of the Congress to give unlimited hospitalization to all nonservice-connected veterans regardless of their financial status, then it should be so stated and appropriations made to carry out the provisions of such an act

I could tell you a great deal about this hospitalization program, but I think that is enough for the time being I am not nearly so emphatic in this matter as is the American Hospital Association

The next important point I would like to talk about is the conference with Dr Magnuson, and what he told us amounts to a great deal the same as he expressed in this communication to Dr Lull of the American Medical Association We discussed that with Dr Magnuson at that meeting, and I think I can save you time by reading this page

> I have been thinking seriously, since I had the conversation with you and Sensenich and some other members of the Board of Trustees of the American Medical Association in Chicago, how we could hook up with the medical profession in this veterans service work
>
> I have just come back from a trip where I went over a lot of our regional offices, and I am very unhappy about the kind of medicine that is being practiced in those places The histories of clinical records are not where they should be in the treatment folders, and the discharge examinations furnished by the Army and Navy are not in the treatment folders so the doctor making the examination does not know the previous history unless he sends for the C file and that takes from three hours to three months to get. They are so pressed that very few competent examinations are made when the patient applies for treatment and the treatment resolves itself into nothing but the treatment of a symptom. Part of it is due to lack of professional personnel lack of space lack of equipment and lack of clerical personnel There are two medical functions in the regional office One is purely and simply examination as for determination of what a man has coming to him in the way of pension due to his disability if any The other is treatment of patients who come to the dispensary complaining of symptoms and who are all service-connected cases Some of these cases undoubtedly come in for treatment so they can build up a record of having had a lot of treatment so that in the future if there is any question of a pension examination they will have a large treatment file Each of these cases should have a thorough and competent physical examination because if they have treatment coming to them we want them to get it and get the best If they do not have treatment coming there is no reason why they should be pampered However we want to be sure and cannot be sure without a thorough examination of the patients' condition
>
> I have thought of two plans that we might put into effect These are connected with the treatment part of the situation only and must not be confused with the pension examination which must necessarily be done in the regional office by men who are trained to make pension evaluations and summaries of medical histories and records

Dr Magnuson asked if I would see what county societies thought about this

> Plan Number 1 To request the county medical society in cooperation with the chief medical officer in cities where regional offices are located, to set up an examining clinic with the best men obtainable for the examination and treatment of patients presenting themselves with medical complaints Sign a contract with the medical society for delivering this service in quarters that the society would provide and equip as a clinic for this purpose The county

medical society through its veterans committee, to act as a recommending body to the chief medical officer so that the men from the county medical society might be appointed as part-time VA doctors appearing at the clinic at definite times anywhere from four hours a week to as much time as the doctors felt they could spare from their practice The doctors could be paid on the basis of the grade to which they were entitled i.e., a young man just out of medical school, interned for a residency could be appointed in junior grade at $4 149 60 to $4,903 per annum, and the salary figured out on the basis of forty hours a week Our grades progress as follows: associate grade $1 902 to $5 905.20; full grade $5 905.20 to $6 869.80; intermediate grade $7 102.20 to $8,050.80; senior grade $8 179 80 to $9,376.60; chief grade $9 975 to $10,900 An additional 25 per cent for board certification is paid by the VA up to a limit of $11 000 per annum Consultants could be appointed on the same basis and either be on call at a specified amount per call or, if there was enough work, they could come in for a certain number of hours per week and have appointments made just as one does in one's own office This plan should take the patient care away from the pension examination doctors and save a lot of confusion.

Plan Number 2 Set up a Treatment Department in our regional offices to be staffed by the same method mentioned above The trouble with this plan is that many of our regional offices are so cramped for space and so short of personnel both clerical and supervisor, that it probably would not be feasible. However where it was feasible it would work as well as having a clinic on the outside There would be no objection to using the same consultants in the pension examinations who were used in the treatment clinic, whether it was set up one way or the other

It is my opinion that the veterans medical committee of the medical society would probably be interested in two ways They would be interested as veterans in seeing that other veterans get good care and as taxpayers to see that there was no imposition on the government in allowing claims that were not just. At least they would be more specific in their records as to whether a man was or was not a bona fide case.

Our answer to that—and we have been in consultation with them—is 'What is the matter with our present plan? It was working all right until the various branch officers picked it all to pieces.

Following that I asked Dr Butler, who is the Branch Medical Director of New York in a letter dated April 15 1948—I had previously talked to him on the telephone, and he asked me to write him a letter—this

Dear Doctor Butler:

We have received several inquiries relating to the medical services being rendered to service-connected cases by outpatient physicians and by outpatient clinics of the Veterans Administration.

Some of these patients have previously been cared for under our Veterans Medical Service Plan and some of them have again been referred back to the physician participant in the plan. I am also informed by Secretary George F Lull, M. D. of the American Medical Association that Doctor Magnuson requested that, through county and state societies we urge physicians to enter into part-time and full time employment in various out patient departments.

Therefore, in New York State I should like to go into our various branches and ascertain more fully the services now being rendered I should like to limit this inspection to that done by our coordinators or by myself personally We should be glad to do this at the various branches in company with someone assigned from the branch inspected At the present time as you know our coordinators have knowledge only of those patients whose records they review In order to give approval to the general health services, we require this additional information. More especially it would mean that the coordinators could follow the treatment course of any service-connected patient as is done in our plan Th coordinators would visit the clinics on occasion. We should like to have the names of physicians their ratings, especially qualifications, and the number of patients they see within a given time This would answer the question of adequate staffing of outpatient departments. We should like some information on the career possibilities for part time and full time employment. The information obtained in the study would be in the same category, as far as confidential information is concerned as that of the work of the coordinators in their past and present capacity I shall much appreciate it if you will allow us to make this study

I wrote that as president of the Veterans Medical Service Plan of New ork Inc and on May 3 received this reply

Dear Doctor Bauckus

Please pardon my delay in replying to your letter of April 15, 1948. I have been out of town for much of the intervening time. Your request is so sweeping and includes so many items which might be regarded as confidential information that I do not feel capable of acting upon it myself I am therefore, referring your letter to higher authority

In the meantime your Coordinators can, of course, continue to send you the same reports that they have forwarded in the past. The present agreement between the V terans Administration on the one hand, and the Veterans Medical Service Plan of New York, Inc acting as agent for the Veterans Administration in providing such care for veterans as the VA is unable to provide in its own hospitals and clinics, runs from year to year concurrently with the federal fiscal year

With very kind regards, I am,

Very truly yours,

Ethan Flagg Butler M D

Branch Medical Director

There are one or two more points. We have been criticized on our fee schedule. The fee schedule is a fee schedule carefully worked out by many physicians and many times discussed with the Veterans Administration It is their fee schedule as much as it is ours We have agreed to and we have made changes where changes were indicated. Any criticism of that fee schedule should be placed upon the Veterans Administration as much as upon our Plan I can see no just criticism of it.

I have heard at times doctors say that some fellows have killed this Plan that they have received too much money as a result of it, that in one way or another they have interfered with good medical care. We have a system in this Plan through our coordinators, and the fact that the coordinators review every report where we know what is going on all the time Never has the Veterans Administration pointed to us about any case at all that we did not immediately investigate it and take action on it. The coordinator if he thinks it is the thing to do advises the removal of the physician from the list. Then I have the right given to me by the Board of Directors immediately to make that removal We have removed six men from the list. In one case it did not apply very well because it was not long before this man was employed as a full-time man by the Veterans Administration here in New York. We inquired about that but they said he was a good man and what he did was not so very bad.

In the resolutions that are presented this morning there are two important items. One is that we ask for the free choice of physician There are so many ramifications about all of this that it would make your hair fall out to think about it and to keep up with it. The reason my hair doesn t fall out is that I have a good hair tonic I think the only way you can handle it at all is by insisting upon the free choice in the new contract—if we have a contract

I might say that Dr Harding who is the assistant director at Washington of this work, and with whom we have talked several times in the past two years, at our last meeting told Dr Anderton and myself that he thought that the coordinators ought not to be employed by the Veterans Plan but by the Veterans Administration itself In other words that will take us out of it entirely

The other point is that I hope we can some time arrange a meeting so that in one room we may have representatives of the veterans organizations of the Veterans Administration, and of the Medical Society of the State of New York. I don t believe that the veterans realize how much is being taken away from them when they lose free choice of physician. Your Board of Directors of the Medical Service Plan has always taken the position that the veteran

may go to any facility that is available, but if he wants free choice he should have it If in New York State under our Workmen's Compensation Laws, the person who was injured during the war working here at home shall receive free choice of physician, as is the case, why shouldn't the veteran in the service-connected case? He is the same sort of case, and I don't think we can take any other stand

I shall be very glad to furnish you with additional information if you would like to have it Nothing I have said here is but what is on paper, so as far as I am concerned, there is not any need for this to be a closed session

VICE-SPEAKER STROHM This report of the President of the Veterans Medical Service Plan, Inc , is open for discussion

There was no response

VICE-SPEAKER STROHM If there is no discussion, is there any motion?

DR HARRY ARANOW, *Councilor* I move it be received with thanks

DR D V CATALANO, *Richmond* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

Section 105 (*See 61, 106*)

Report of Subcommittee on Cults

VICE-SPEAKER STROHM We will now go into the discussion of the Report of the Subcommittee on Cults of the Council Committee on Legislation, of which Dr Dattelbaum is the chairman

SECRETARY ANDERTON I move that Dr Lochner, the Secretary of the New York State Board of Medical Examiners, be invited to the House during the rest of this closed session

DR. HARRY ARANOW, *Councilor* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

VICE-SPEAKER STROHM Will somebody near the door get Dr Lochner and escort him in?

Now may we hear from you, Dr Dattelbaum?

DR MAURICE J DATTELBAUM, *Councilor* Mr Speaker and members of the House of Delegates, this report was referred to the Reference Committee on Legislation Dr Eggston is the chairman of that Reference Committee, so the procedure that I thought would take place would be that the Reference Committee would bring in its report, and if there were any questions, I would answer them because everybody has received a copy of this report

If the House wants me to report what we have done, and then hear what the Reference Committee suggests, why that would be all right with me

CHORUS No, let's hear the Reference Committee first

DR JAMES F ROONEY, *Trustee* I move we hear the report of the Reference Committee first, and that Dr Dattelbaum may then be called upon to explain any points in the original report that may come into question

DR SAMUEL B BURK, *New York* I second the motion

There being no discussion, the motion was put to a vote, and was unanimously carried

Section 106 (*See 61, 105*)

Report of Reference Committee on Report of Council IX Report of Subcommittee on Cults

DR ANDREW A. EGGSTON, *Westchester* I don't want to be a copycat, but I will match my committee for punctuality and efficiency with any of the rest of them It consists of Dr John L Edwards, Dr Samuel B Burk, Dr A W Martin Marino, and Dr Felix Ottaviano, and, as you will remember, the whole book was thrown at us yesterday I won't attempt to read it all, but when we get through you will get it most likely

Your Reference Committee has reviewed the extensive report of the Subcommittee on Cults of the Council Committee on Legislation Cognizance was taken of the thorough method and scientific approach to this question by the committee You have received the report, as it was distributed this morning, and you have undoubtedly read it by now Your Reference Committee recommends to this body for deliberation two distinct paragraphs in this report In case you did not memorize the report, let me give them to you

First, the last paragraph, part one, page 6, which reads as follows

> "After considering all phases of the matter, the Subcommittee unanimously voted to recommend to the House of Delegates that the Legislative Committee be empowered to draw up and have introduced legislation to implement the enforcement of the present Medical Practice Act by the use of the injunctive procedure against cult practitioners It was suggested that the Legislative Committee consult the legal staff to consider the availability of any other efficacious measures in addition to the injunctive procedure"

Second, the penultimate paragraph in Part 3, page 8, which reads

> "The Subcommittee, after intensive study of the Basic Science Laws in other states, believes there is some merit in the principles involved but recommends that the House of Delegates does not approve a Basic Science Law in this State at this time as our Medical Practice Act performs the same functions"

Your Committee recommends that the wording of this paragraph be changed as follows

> "The Subcommittee, after intensive study of the Basic Science Laws in other states, believes that there is some merit in the principles involved, but suggests to the House of Delegates that they find no need for a Basic Science Law in this State at this time, as our Medical Practice Act performs these same functions"

To quote the report further

> "The use of this injunctive procedure, as recommended in Part II of this report, is recommended, to control cult practice in New York State"

Your Reference Committee approves this report for discussion, and furthermore "urges the Council to introduce the necessary recommended injunctive legislation in the 1949 legislation session," if the House of Delegates concurs in this action

I move the adoption of this report

DR SAMUEL B BURK, *New York* I second the motion

VICE-SPEAKER STROHM You have heard the motion made and seconded that this report be adopted Is there any discussion?

Do you want that adopted as a whole?

DR EGGSTON As a whole, yes

After much discussion, the report of the Reference Committee was adopted

Section 107 (*See 15*)

Report of the Reference Committee on Report of Council, Part IX Legislation

DR. ANDREW A EGGSTON *Westchester* Your Reference Committee has reviewed with interest the work of the Legislative Committee

It is noted that while the 1948 session of the New York legislature was short, it was, nevertheless, a very busy one because of the record number of bills that were introduced Your Legislative Committee followed diligently 93 bills in the Senate and 125 in the Assembly, with the notation that of 121 individual bills 31 were passed by both houses. The Governor signed 29 and vetoed two These bills received an unusual amount of devoted attention by your Legislative Committee which issued frequent and concise bulletins to other legislative committees and thus directly to members of the Society Their deliberation resulted in final and crucial influence upon many bills.

There were no bills against vivisection introduced at this session. Likewise, no chiropractor bill appeared which received serious consideration How ever, in view of such a contingency the committee was fully prepared by a full-fledged campaign to defeat such an effort. The calmness by which this defeat was taken by those interested may simply presage a much greater effort to have a licensing law enacted Therefore, eternal vigilance must be our watchword

Your Reference Committee wishes to point to a serious and fatal development in regard to three bills which were introduced at the request of certain interests in the State Society

First, Fino-Clancy X ray Bill which met with so much opposition from some angles of the medical profession that resulted in its amendment which would have caused its defeat as a result, your Legislative Committee had to retract its former position of support.

Second, the Fino-Hanniford Bill which was contrived to return many medical activities to the county medical society in the medical care of workmen s compensation. This bill after it was introduced, failed to receive strong support from many sections of the State

Three, the Young-Graci Bill which related to the penal punishment of anyone treating the human body without proper licensure. This was defeated because of the vagueness of its construction which made it undesirable.

It is indeed a bad position in which to place the Legislative Committee and Executive Officer to be compelled to retract their position in regard to any bills introduced. It has happened that bills have been favorably voted by both houses at the urgent request of our representatives only to have them be opposed later as a result of belated medical opposition.

The Governor has even been urged to veto bills that have been passed which were not opposed and even received a measure of support. Such poorly considered actions will greatly weaken the position of the medical profession in obtaining the passage of proper legislation to say nothing of the ominous position in which the Medical Society is placed. All groups, and especially the specialty ones, should first develop a unanimity of opinion before bills are introduced and support solicited. In other words let me interject that we must not be like the man on the flying trapeze.

As a result of a number of bills, provision was made for the establishment of a State University to encompass medicine as well as many phases of education This action will undoubtedly have far-reaching effects upon medicine, and its deep roots will have to be carefully followed with a watchful eye for any detriment to the present educational standards and medical care in this State.

Numerous other pertinent bills were carefully considered by the Legislative Committee but brevity is here exercised in their review

The Legislative Committee finally appealed to all members of the State and county societies to be vigilant and use their influence in educating the public and their legislators of all important matters for the medical good of the public. It is needless to repeat that these are changing and testing times and your Legislative Committee is our most important agency to aid medicine in the proper adjustment to all new phases of human welfare.

The report of the Legislative Committee should be carefully read by all members of the Society The Legislative Committee, as well as our executive officer Dr Robert E. Hannon deserve the gratitude and open recognition of this House of Delegates.

Your Reference Committee recommends the adoption of these reports of a Legislative Committee consisting of Drs. Aranow Mott, and Holcomb and I so move.

DR. SAMUEL B BURK *New York* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 108 (See 38 49)

Report of Reference Committee on Miscellaneous Business B Change in Constitution of American Medical Association in Regard to Acceptance for Membership of Doctors in County Medical Society Irrespective of Race, Color, or Creed

DR. WILLIAM B RAWLS, *New York* I have two resolutions that I would like to report on in executive session one from Dr Burk of New York County and the other from Dr J Lewis Amster of Bronx County

We have considered both of these resolutions as one since they both relate to the same question. The one presented by Dr Burk of New York County, I will read in toto Dr Amster, who presented the one from Bronx County was a member of my committee and agreed to accept the one from New York County and also to accept what corrections we made in it

The subject is changing the Constitution of the American Medical Association in regard to acceptance for membership of doctors in county medical societies irrespective of race color or creed

As revised, it reads

"WHEREAS some county medical societies in various parts of the United States exclude from their membership physicians of certain races, regardless of their professional ability or ethical standing and

"WHEREAS, physicians so excluded from county societies are thereby excluded from membership or fellowship in the American Medical Association and

"WHEREAS physicians excluded from membership in the American Medical Association are for that reason denied the right to apply for membership in other national professional societies where membership in the American Medical Association is a prerequisite, and

"WHEREAS these physicians are thereby restrained in the legitimate pursuit and furtherance of their professional activities, and

"WHEREAS, this exclusion of physicians on the basis of race constitutes a violation of our American democratic ideal, therefore be it

"*Resolved*, that Article 4 of the Constitution of the American Medical Association be amended in the following manner The present Article shall be Section 1 of the new Article 4 and the following paragraph shall be added as Section 2 of Article 4

'No component Society of the American Medical Association shall exclude any qualified physician from its membership by reason of race, creed, or color,'

and further be it

"*Resolved*, that the delegates of the Medical Society of the State of New York shall be instructed to introduce this resolution at the annual meeting of the House of Delegates of the American Medical Association at its annual meeting in 1948"

Your Reference Committee made very slight changes therein The first one, two, three, and four "whereases" are all the same The fifth "whereas," which read as follows

"WHEREAS, this exclusion of physicians on the basis of race constitutes an affront to our colleagues, a degradation of the honored traditions of our profession, and a violation of our American democratic ideal,"

was changed to read

"WHEREAS, this exclusion of physicians on the basis of race constitutes a violation of our American democratic ideal,"

and then it follows through the same with the resolved portion except it ends this way

"*Resolved*, that the delegates to the American Medical Association from the Medical Society of the State of New York shall be instructed to introduce this resolution at the annual meeting of the House of Delegates of the American Medical Association at its annual meeting in 1948"

I move its approval as thus revised

DR. HAROLD B DAVIDSON I second it

There being no discussion, the motion was put to a vote and was unanimously carried

Section 109 (*See 21, 59*)

Introduction of President of the New Jersey State Medical Society

DR JAMES F ROONEY, *Trustee* I rise to a question of personal privilege I am informed that the President of the New Jersey State Medical Society is in the rear of the hall In respect and honor to the head of one of our sister societies, I would ask that the Chair appoint a committee to take him to the rostrum

VICE-SPEAKER STROHM Dr Cunniffe and Dr Kenney, will you please bring Dr Norton to the rostrum?

The delegates arose and applauded as Dr Edward R Cunniffe, Trustee, and Dr J Stanley Kenney, Councilor, escorted Dr James F Norton to the rostrum

VICE-SPEAKER STROHM Dr Norton, have you a word for us?

DR JAMES F NORTON Mr Speaker and members of the House of Delegates, in sitting in the back with Stan Kenney and Ed Cunniffe it sounded like it might be at Atlantic City this was going on They are the very same topics that are involved, the same fight with the Veterans Administration and what they promised to do, and, as far as we in New Jersey are concerned, what they did not do They left us high, wide, and not too handsome We spent a lot of money setting up a procedure for handling the Veterans Administration matter in New Jersey I don't know who pulled it from under us, but while I don't know whether it was Hawley, or whether it was Harding, it was somebody in New Jersey, and we are worse now than when we started

Then we hear you have your chiropractors in New York, the same as we do in New Jersey I thought we were the only ones who were plagued by chiropractors You apparently also have chiropodists You call them over here by a little different name than we do, you call them podiatrists, but we call them chiropodists in New Jersey

I am honored to be selected by the New Jersey State Society to bring you greetings, and to tell you seriously that we look to New York State for a lot of guidance in matters concerning the medical profession You are, of course, the most powerful, the most potent state organization in the entire country New Jersey just lies on the other side of the river, hemmed in on one side by your big State and on the other side by the other big state of Pennsylvania, so we do not have much to do except to look either to the right or to the left, and we like to look to the right (*Laughter*) So I seriously pray you that you deliberate with wisdom and continue to show us the kind of leadership and guidance we hope to get from such a fine august body as this House of Delegates (*Applause*)

Section 110 (*See 76*)

Report of Reference Committee on Report of Council, Part XII Nursing Education

VICE-SPEAKER STROHM Dr Geis, chairman of the Reference Committee on Report of the Council, Part XII, has a report to make We are still in executive session

DR JOSEPH A GEIS, *Essex* I don't know whether I dare stand up here again or not, I thought I would get shot this morning

This is the report of the Reference Committee on Report of the Council, Part XII, on Nursing Education

Your Reference Committee agrees with the Committee on Nursing Education in the efforts made to license qualified nurses by endorsement of license held in other states or in the Canadian Provinces

We firmly believe that there is a serious shortage of bedside nurses Since this morning we have learned that there is a commission studying nursing on the level of patient requirements As this commission is to make its report before the next session of the legislature, we make no recommendations at the present time This commission is independently financed We recommend that the Council Commission on Nursing Education strongly present the doctor's viewpoint that bedside nursing is of prime importance

We agree with the Council Committee that some of the shortage is due to the shortening of the work week We seriously question this ability of the average family to pay a living to either a nurse or anyone else for the ridiculously small number of hours they are now willing to work

We agree with the suggestion that the profession as a whole give thought to the nursing situation and suggest that, after due consideration, they write their ideas to the Council Committee for consideration

We realize that your Council Committee is in a difficult spot They must not only represent the medical profession and their patients but also must work with the New York State Hospital Association, the New York State Professional Nurses Association the Practical Nurses of New York and the State Education Department All of these organizations have their own ideas and often do not see eye to eye with us. This Committee deserves great credit for its share in keeping the Coordinating Council for Nursing Problems alive

I move the adoption of this report

DR. AARON KOTTLER *Kings* I second it

VICE-SPEAKER STROHM It has been regularly moved and seconded that this report be adopted Is there any discussion?

DR. WILLIAM B RAWLS, *New York* There is one word in there which I don t believe is necessary and it is just going to offend some people I refer to the word ridiculously small number of hours. I would suggest the deletion of the word "ridiculously and instead say the small number of hours

DR. GEIS On behalf of the Reference Committee I will be glad to accept that.

VICE-SPEAKER STROHM Is there any discussion on the report as amended and accepted by the Reference Committee?

The question was called and the motion was put to a vote and was unanimously carried

Section 111 (*See 64*)

Report of Reference Committee on Report of Council, Part XII The Report of the Temporary State Commission on Coordination of State Activities

Dr Strohm s resolution was thoroughly discussed item by item and was referred to the Council for consideration.

VICE-SPEAKER STROHM If there is no further business to come before the Executive Session we will rise and report.

DR. ROONEY I move that the Committee of the Whole rise and report, and after that motion is put I would like to have the privilege of making another

DR. E. P FLOOD *Bronx* I second that.

There being no discussion the motion was put to a vote and was unanimously carried

DR. ROONEY I now move we take a recess of five minutes before we reconvene as the House of Delegates.

DR. SAMUEL Z FREEDMAN *New York*. I second that.

There being no discussion, the motion was put to a vote and was unanimously carried

After recess the House of Delegates reconvened at 6 00 P.M.

SPEAKER ANDRESEN Members of the House, I have bad news for you We still have something like 15 or 16 reference committee reports to consider The discussion has been entirely too long this afternoon. I think it was important to have it, but I realized that this question was bound to arise when I asked you to have most of those arguments before the reference committees yesterday afternoon Now we have 15 or 16 more reference committee reports to consider and the question comes up what are we going to do I would suggest if we would keep on now until about seven o clock that we could possibly take up some of the reference committee reports tomorrow while the votes are being counted Tomorrow morning the election of officers is the first order of business, and while the tellers are busy counting, we could take up some more reference committee reports. My suggestion is that we continue for another hour until seven o clock otherwise the only thing we can do is to reconvene tonight at eight o clock and continue then until we get through which might be eleven or twelve o clock.

DR. JAMES F ROONEY, *Trustee* I would like to say this If we don t dispose of most of this business tonight, we are very likely to make some frightfully sad mistakes in trying to hurry a number of perhaps important reports tomorrow morning That was one reason why we instituted an extra day s meeting of the House of Delegates because of the many errors that were made by the House in hasty consideration of important reports I entirely concur with what the Speaker has said I know that I am going to have to break an engagement with my wife. We were going to the theater, but I would rather get this thing through and I think for the sake of the Society and the good of all of us we had better follow the Speaker s suggestion and carry on until seven, and at least clean up most of the deck so we don t do what I have seen happen so often at this last morning s session when many things have been done very unwisely

SPEAKER ANDRESEN All in favor of continuing until seven o clock say Aye , contrary "No " It is so ordered we will continue until seven o clock I hope by then we will be able to get through with a good many reports.

Dr Eggston has four or five resolutions that were referred to his committee and I think we will have to take those up now and get them over with

Section 119 (*See 53*)

Report of Reference Committee on Report of Council, Part IX Podiatry Legislation

DR. ANDREW A. EGGSTON *Westchester* This is another resolution on the Podiatry Bill introduced by Dr Samuel Gitlow of the Bronx

"WHEREAS podiatry is a technical minor adjunct of orthopedics and

I want you to notice that sentence.

"WHEREAS many systemic diseases have manifestations in lesions of the lower extremity and

"WHEREAS, the Institute of Podiatry is not a medical school and

"WHEREAS the licensed podiatrists have been active in attempting to pass legislation in this State to extend the limitations of their licensure and we have eliminated to include treatment of systemic diseases

"WHEREAS, the treatment of disease constitutes the practice of medicine under the laws of this State and

"WHEREAS the passage of such legislation would be detrimental and hazardous to the public health and welfare, therefore be it

Resolved that the Medical Society of the State of New York put itself on record as being opposed to such legislation and be it further

Resolved that the Governor and members of both Senate and Assembly be sent copies of this resolution and be it further

Resolved that the Legislative Committee and our Albany representative be instructed to govern themselves accordingly and be it further

Resolved, that the content of these resolutions be made known to the Board of Regents of the State of New York."

Your Reference Committee approves of this

resolution with the deletion of the first paragraph I so move.

DR EDWIN A GRIFFIN, *Kings* I second the motion

DR. JAMES F ROONEY, *Trustee* I move to substitute, if I may, that this whole matter be referred to the Council for appropriate and necessary action

DR LEO F SCHIFF, *Clinton* I second the substitute motion

DR FREDERICK W WILLIAMS, *Bronx* Is this House being put in the position where it cannot pass a directive to the Council?

SPEAKER ANDRESEN The motion is to refer this resolution to the Council Is there any further discussion?

DR ROONEY I don't see how the House can get any better directive to the Council than referring this motion and the report of the Reference Committee which embodies the content of the resolution to them Do what you want to, gentlemen, but the Council will have to take action on it anyway, and I am referring it to them for the necessary and appropriate action

DR. WILLIAMS I would like to

SPEAKER ANDRESEN Let me call your attention to the rule that you can only speak once on the same subject

DR. WILLIAMS But Dr Rooney discussed it

SPEAKER ANDRESEN He made the motion and he discussed it.

DR. WILLIAMS He discussed motions previously several times, in fact, not half an hour ago he discussed one motion four times I would like to ask does Dr Rooney's motion include that this is a directive to the Council?

DR. ROONEY I would like to have my friend when he speaks to address the Speaker If he wants to ask me a question, address the question to the Speaker I don't know whether I have permission to answer him or not because there are parliamentary rules that must be followed May I answer taking it as inferred that that is what was done?

SPEAKER ANDRESEN Yes

DR ROONEY You asked whether this is a directive to the Council I think that Dr Eggston quoted a directive to the Council, and my motion was that it be referred to the Council for the necessary and appropriate action Does that answer your question?

DR. WILLIAMS I second the motion

DR. THOMAS M D'ANGELO, *Queens* I think that Dr Rooney is making a substitute motion, and that it would have been better to have amended the original motion

SPEAKER ANDRESEN Dr Rooney's motion is to refer and was made as a substitute motion but is really a motion to refer

DR D'ANGELO While he made it as a motion to refer, he could have made an amendment to the motion that the matter be referred

SPEAKER ANDRESEN But he didn't He made a motion to refer

DR. ROONEY I want to get something in

DR. D'ANGELO What are we going to refer?

DR. M RENFREW BRADNER, *Orange* Did I understand that the first sentence was deleted?

DR. EGGSTON The Reference Committee recommended that it be deleted, and the motion as made by the Reference Committee is referred to the Council for appropriate action, as I understand Dr Rooney's motion

DR. ROONEY Right

DR. BURRILL B CROHN, *New York* What are we referring?

DR D'ANGELO I don't know what we are referring

SPEAKER ANDRESEN We are referring the report made by the Reference Committee, which includes the deletion of that first "whereas"

DR D'ANGELO Are we referring a motion to the Council?

SPEAKER ANDRESEN We are referring the matter concerned in the resolution

DR D'ANGELO Without any action by the House?

SPEAKER ANDRESEN It is a recommendation

DR ALFRED ANGRIST, *Queens* Point of information are we approving or disapproving this resolution? If we are referring this matter with the approval of this House, that is one thing, but if we are referring it to the Council with the inference that it carries no weight of approval or disapproval, I would be opposed to the motion made by Dr Rooney

DR ROONEY May I have the unanimous consent of the House for three seconds?

A motion to refer is a directive to the body of reference, parliamentarily At least that is the way I was brought up, though I have found it has all gone crazy lately We are supposed to be a parliamentary body The point is this The Committee recommended that the first sentence, as I recall it, be deleted I moved that the whole matter, including the deletion proposed by the chairman of the Reference Committee, be referred for necessary and appropriate action to the Council Now, if you will tell me that that does not mean approval and a directive to the Council, gentlemen, go ahead and argue it until half past ten tonight

DR. CHARLES GULLO, *Livingston* It seems to me that you approved everything else up to now or disapproved it Now Dr Rooney is asking that we refer this, which involves just the deletion of one small portion, to the Council It seems to me that this House of Delegates can decide now the appropriateness of whether we should delete that or not

SPEAKER ANDRESEN The House can if they decide not to refer it

Is there any further discussion on the motion?

DR EGGSTON This resolution is very similar to the one that we passed in 1947

DR. ROONEY I know

The question was called, and the motion was put to a vote and was carried

SPEAKER ANDRESEN It is referred to the Council

Section 118 *(See 42)*

Report of Reference Committee on Report of Council, Part IX Amendment of Hospital Lien Law to Include Physicians' and Surgeons' Bills

DR. ANDREW A EGGSTON, *Westchester* This is a resolution which has for its purpose the amendment of the Hospital Lien Law to include physicians' and surgeons' bills I don't know who presented it.

CHORUS Dutchess

DR. EGGSTON This may be a little more pleasant, I don't know It reads

> "WHEREAS, it is well known that physicians and surgeons treating automobile accident cases are unable, in many instances, to collect the payment due them for their services because the patient goes to his home in some distant community as soon as he is able to be moved, and settlement of his claim is often made without the physician being aware so that the aforesaid physicians and surgeons lose considerable sums of money with no redress, and

"WHEREAS the hospitals in which these cases are treated are protected by Section 189 of the Lien Law be it

Resolved that the 1949 session of the New York State Legislature be requested to amend Section 189 of the Lien Law to include the bills of physicians and surgeons for services rendered in the same cases as enumerated in said Section 189 of the Lien Law

Your Reference Committee approves of this resolution and I so move.

DR. EDWIN A. GRIFFIN, *Kings* I second the motion

There being no discussion the motion was put to a vote and was unanimously carried.

Section 114 (*See 41*)

Report of Reference Committee on Report of Council, Part IX Legislative Committee Activities

DR. ANDREW A. EGGSTON, *Westchester* On the resolution introduced by Dr Knickerbocker relating to Legislative Committee Activities reading

"WHEREAS, in addition to other expenses, for bills which did not pass through the office of the Executive Officer Dr Robert R. Hannon it cost the State Society $734.32 in 1946 $771 96 in 1947, and $918.50 in 1948 to conduct the annual conference of county legislative chairmen thus making the 1948 conference cost well over $1 000 and

"WHEREAS, the report of the Treasurer and Trustees indicates that unless we administer our available income on a more stringent basis there will again result a deficit and

"WHEREAS, while those conferences are interesting instructive, enjoyable and a definite social success they do not accomplish the purposes for which they were designed due to the apathy and negligence of the county legislative committees, and

WHEREAS reports read at the 1948 conference prove this to be a fact and

WHEREAS, unless these county legislative committees wake up take their assigned duties seriously and wholeheartedly support the Legislative Committee of the State Society and the Executive Officer Dr Robert R. Hannon their efforts in our behalf are bound to failure, and

"WHEREAS this resolution is not to be considered as any reflection or criticism of the State Society s Legislative Committee or Executive Officer Dr Robert R. Hannon and

WHEREAS, it would seem to be within the province of some executive division of the Society to institute such changes as may be indicated to the end that the component county societies will become an active integral part of the legislative program, therefore be it

Resolved that this matter be referred to the Council for consideration and institution of such measures as will make our legislative program an outstanding success

Your Reference Committee recognizes the increasing cost of the Annual Conferences of the County Legislative Chairmen. However it feels that the expenditure of a reasonable amount of the Society's funds is necessary and valuable if by judicious use of the monies the Committee can properly present and influence favorable legislation. Undoubtedly the amounts spent by opponents of the medical profession are many times what we spent for our Legislative Committee. It certainly behooves the chairman of each County Legislative Committee to take a keen interest in his position and usefulness to good medical legislation

These problems should definitely be referred to the Council for advice and action Your Reference Committee approves of this resolution I so move

DR. A. W MARTIN MARINO, *Kings* I second it.

SPEAKER ANDRESEN It has been regularly moved and seconded that this resolution be approved Is there any discussion?

DR. HOMER J KNICKERBOCKER, *Ontario* I may be ruled out of order, I don t know

Our Legislative Program is not accomplishing what it should Unless it can be better supported, it might as well be abandoned, save the cost, surrender to the chiropractors and all the other cults let them have it, lock, stock and barrel admit we do not care enough about what happens to put forth sufficient effort to save our necks.

This is not the fault of the State Society's Legislative Committee nor the executive officer in Albany The trouble lies in the county societies and their legislative committees Figures presented by Dr Hannon at the Legislative Committee Chairmen s Conference indicated that he received less than 20 per cent answers, for or against bills he sent out for comment. Of these, 2 per cent had no opinion Approximately 77 per cent of the county legislative committees made no reply

With such a showing it is no wonder that the members of the Legislature give us the brushoff

How can this be remedied? Reorganize the district branches If necessary redistrict the whole State. Have each district employ a full or part-time executive officer, working with the State executive officer and the Council Have him contact the county societies in his district thoroughly and often Bring the affairs projects, and desires of the state societies to the county level. In this way interest can be created and inadequacies corrected In other words take our problems to the grassroots and listen for the echoes. Keep eternally at it until we have what we should have, not only along legislative lines, but along other lines of effort.

The time has passed when "Let George do it' suffices. We must interview George personally and see that he acts as he should That costs money Where is it coming from? Let each district levy an assessment either direct or through the county societies Give them a free dinner at the meetings. Use the remainder for the program

There is an old saying that the way to a man s heart is through his stomach. Feed the brutes, and watch them flock to the cause. Until something of this kind can be developed, may I present a further suggestion If every delegate to this meeting will go home contact at least one legislative representative from his area, explain to him that the Medical Society of the State of New York is devoted to the health and welfare of the people as much as its own, we will get somewhere. Tell the legislators that next year we will introduce another bill aimed at the elimination of all kinds of quacks, and solicit their interest and support of measures sponsored by and/or approved by this Society If each of you will do this, it will be of great help in laying the foundation for better success in the legislature than we have heretofore been accustomed to.

The question was called, and the motion was put to a vote and was unanimously carried.

Section 115 (*See 57*)

Report of Reference Committee on Report of Council, Part IX Partnership and Group Practice

DR ANDREW A EGGSTON, *Westchester* I have here two resolutions that were introduced by Dr Aaron Kottler, but he had the titles of them mixed up, so in our writing them up we had to rearrange them One was on group practice and the other was on x-ray, but he had the title of the x-ray one on the group practice, and the title of the group practice on the x-ray In presenting these resolutions, it is up to the person who presents them to see they are done in the proper way, or at least I think it should be

On the one that we changed the title from "X-Ray as a Practice in Medicine" to "Partnership and Group Practice," it reads

"WHEREAS, the New York State Legislature enacted Senate Introductory 740 Printing 2142 in the 1947 Legislature which is now a chapter of the laws of 1947 of the State of New York, and

"WHEREAS, said law amends the Education Law in relation to the practice of medicine by physicians as partners and permits the pooling of fees and monies for medical services by the members of the partnership or group and employes of such partnerships or groups, and

"WHEREAS, said bill does not specify or limit the number of partnerships or groups to which an individual physician may belong, and

"WHEREAS, under the present bill, a physician might be a member of more than one group and use this as a subterfuge for the division of fees, and also create a situation where said member of more than one partnership might be tempted to render services for less than the agreed fee among the group, and

"WHEREAS, said bill permits a division of the fees with an employe who does not necessarily have to be a physician under the terms of the bill, therefore be it

"*Resolved*, that we request that legislation be introduced in the 1949 session of the New York State Legislature amending the recently enacted law concerning group practice or partnership, and incorporating therein provisions or amendments to correct the foregoing objections"

Your Reference Committee recommends that this resolution be submitted to the Council for action before the 1949 legislative session

DR. EDWIN A GRIFFIN, *Kings* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 116 (*See 86*)

Report of Reference Committee on Report of Council, Part IX X-Ray as a Practice in Medicine

DR. ANDREW A. EGGSTON, *Westchester* This is the second resolution submitted by Dr Kottler, and it refers to x-ray as a practice in medicine

"WHEREAS, a bill to amend Section 1250 of the Education Law of the State of New York in relation to practice x-ray diagnosis and treatment and treatment by radium was introduced in the 1947 legislature, which bill was not passed, therefore be it

"*Resolved*, that the Medical Society of the State of New York request that a bill be introduced in the New York Legislature in 1949 as follows

'X-ray diagnosis means that method of medical practice in which demonstration and examination of the normal and abnormal structures, parts of function of the human body are made by use of x-rays, and any person who holds himself out to diagnose or able to make or makes any interpretation or explanation by word of mouth, writing or otherwise, of the meaning of a fluoroscopic or registered shadow or shadows of any part of the human body made by the use of x-rays, and also the use of x-rays or radium for the treatment of any human ailment, shall be deemed to be engaged in the practice of medicine within the meaning of this article, and Section 1262 as follows The provision of this article shall be deemed to prohibit the practice of x-ray diagnosis, x-ray therapy, or radium therapy, as defined in subdivision 7A of Section 1250 of this chapter by any person other than a person licensed as a physician, a dentist, an osteopath, or a podiatrist'

Be it further

"*Resolved*, that the Medical Society of the State of New York actively work for the passage of this bill in the Legislature during the year of 1949"

Your Reference Committee approves of this resolution I so move

DR A W MARTIN MARINO, *Kings* I second the motion

DR THOMAS M D'ANGELO, *Queens* Do I infer from that that the maker of the resolution is trying to make a bill of that, which the Council will in some way or another have to implement, and that if the Council changes a word of that, as a result of its deliberations with the legislators, they are going to be censured? Here is an individual trying to write a bill I think the whole thing should be disapproved

DR WILLIAM KLEIN, *Bronx* I move it be disapproved

DR D'ANGELO I move it be tabled

DR. EDWIN A GRIFFIN, *Kings* I second the motion to table

DR. AARON KOTTLER, *Kings* Dr D'Angelo spoke, then he makes a motion to table You cannot speak on a motion to table According to parliamentary law all he can do is to ask for the previous question on the motion to table, but he cannot speak and make a motion to table at the same time

DR D'ANGELO I made my motion after I discussed it I did not make my motion to table before

DR. KOTTLER But that is out of order That is against parliamentary procedure

CHORUS No

SPEAKER ANDRESEN The other way around it would be, but this way it is in order

DR. WILLIAM KLEIN I moved we disapprove, and then he said I move to table

DR D'ANGELO The motion to disapprove was not seconded

DR KOTTLER I would like to be heard

DR D'ANGELO To facilitate matters I will withdraw my motion to table

DR KOTTLER I have nothing to say about this, as long as Dr D'Angelo withdraws his motion to disapprove this resolution

I am not attempting to write a bill This bill was written in 1947 by Assemblyman Clancy, and I am trying now to reintroduce that bill with certain corrections that caused the defeat of that bill in 1947

DR. LEO F SCHIFF, *Clinton* I think we could settle this in a moment if we were so minded, and I am going to ask the chairman of the Reference Committee if he does not feel that this would be a fitting

way to do it to give this subject matter with the approval of the Committee in principle and refer it to the Council for action?

SPEAKER ANDRESEN Do you accept that?

DR. EGGSTON I accept that.

DR. STEPHEN R. MONTFITH, *Rockland* I second it

SPEAKER ANDRESEN The motion is to approve in principle and refer to the Council for action Is there any further discussion?

The question was called and the motion was put to a vote and was unanimously carried

Section 117 (See 18 55)

Report of Reference Committee on Report of Council, Part IX Supplementary Report of Council, Economics—Amendment to Education Law, Section 6501

DR. ANDREW A. EGGSTON *Westchester* This is the last one. This was marked 'Economics' but it was handed to the Legislative Committee, and I will read it to you

"As a result of Report of Reference Committee on New Business B of the 1947 House of Delegates, a resolution concerning conditions governing the relationship between the hospitals and specialists of laboratory medicine in the State was referred by the Council to a Subcommittee of the Economics Committee This Subcommittee conferred with and had correspondence with representatives of the Joint Council of Pathologists, Radiologists Anesthesiologists and Physical Therapy Physicians. That body has recommended an amendment of the Education Law as follows

'Education Law

Section 6501 Definition.

'4. The practice of medicine is defined as follows A person practices medicine within the meaning of this article except as hereinafter stated, who holds himself out as being able to diagnose treat operate or prescribe for any human disease pain, injury deformity or physical condition and who shall either offer or undertake, by any means or method, *including the use and interpretation of radiographs fluoroscopic observations, prescription and administration of radiation therapy examination of human tissues or fluids physical therapy procedures and anesthesiology* to diagnose treat, operate, or prescribe for any human pain injury, deformity or physical condition' (Italicized phrases are new matter)

"Your Subcommittee recommends that the House of Delegates authorize the Council to request members of the 1940 New York State Legislature to amend the Education Law as above specified

This was signed by J Stanley Kenney M D Madge C L. McGuinness M D Theodore J Curphey, M D, Harold C Kelley M D, Ross Golden M D, M J Fein M D and Walter W Mott, M.D *Chairman*

Your Reference Committee approves of this amendment to the Education Law in principle I so move.

DR. EDWIN A. GRIFFIN *Kings* I second the motion.

DR. HARRY ARANOW *Councilor* Mr Speaker Ladies and Gentlemen, it is getting late and we are apt to pass through legislation which is going to be very damaging or resolutions that are not proper This is the nastiest thing that has been proposed so far today The Medical Practice Act of New York State is considered the best medical practice act in the country It took us a long time to be able to get it passed through the Legislature I see Dr Van Etten here and he will tell you what a long time it really was. I know for I had something to do with getting it over at that time You would never dare to open it without dire consequences. This thing would split it wide open and take the heart out of it. The definition of Medical Practice as now contained therein is excellent It covers every specialty It covers obstetrics it covers gynecology it covers x ray it covers anesthesiology Everything is included in the definition as it is now As soon as you begin to include the different denominations you weaken it. By the way when they are putting in these specialties there is nothing to prevent them to put in naturopathy—just one word—and the whole bill is dead.

I am firmly opposed to anything that will split the Medical Practice Act wide open the way this is proposed It is one of the most dangerous things we have suggested yet If they want bills to legalize x-ray or pathology or whatever it is, let them draw up the bill and give it to us and we will be glad to introduce it.

DR. JAMES F ROONEY *Trustee* I just wanted to add my word of approval to what Dr Harry Aranow has just said. That is what all the quacks are waiting for is for us to start to amend the initial paragraph in the Medical Practice Act, which is the definition of medicine At that very moment there will be motions by chiropractors, naturopaths osteopaths and the rest. You can wreck the bill if you force the Council and force the Legislative Committee to introduce this thing

I feel we should not attempt to meddle with this at present and I am going to move as a reference that the whole matter be referred to the Council for such necessary and appropriate action as they desire to take.

SPEAKER ANDRESEN Do you want to delete the approval in principle that they recommend and instead just refer it to the Council?

DR. ROONEY I will not even delete that, Mr Speaker I will refer the whole matter to the Council for necessary and appropriate action.

DR. WILLIAM KLEIN, *Bronx* I second it.

DR. MADGE C L. MCGUINNESS, *New York* Mr Speaker and fellow sufferers, I don t understand why just because we wish to define what is the practice of radiotherapy and what is the practice of pathology this should be treated like dynamite. What is the matter? Do we really amount to any thing? Is the Medical Practice Act for us and for the welfare of the public or is it just to give us a ball to throw around?

We have been trying to get some recognition Instead the gentlemen here talk like the hospital superintendents who say we are nothing but a lot of hospital hirelings and have no rights except as they give them to us.

After all are we specialists or not? Most of us have our boards. Are we physicians or aren t we? We have had to be trained as physicians and then we take up these specialties. If it were any other specialty everybody would be on their feet. I do not see why we four specialties are treated as we are We are physicians and we do a good deal of work in the hospitals, yet mostly it is the men in the other specialties who are opposed to us. I don t under-

stand that, and I can't understand Dr Aranow's idea that we are going to pull the Medical Practice Act to pieces by including these four specialties as the practice of medicine I don't understand why Dr Rooney feels that way either You will have to tell us something better than that Truly, any radiologist knows what he has to put up with, any pathologist knows what he has to put up with, and as for anesthesiology, they have been through enough trouble As for physical medicine, we are the worst off of the lot

Mr Speaker, I object very strenuously to the way this bill is being treated

DR. NATHAN B VAN ETTEN, *Past President* Mr Speaker and members of the House, it took us eight years to write the Medical Practice Act Over and over again we took out various parts during this procedure, and finally we were able with the assistance of a very strong committee of this body, in association with the New York Society of Medical Jurisprudence, very eminent lawyers and judges who gave this very clear and careful attention, to get it through As a matter of fact, not one step in that Medical Practice Act was created without the specific advice of a very distinguished lawyer We also had the clear mind of one of the greatest governors in New York, Mr Alfred E Smith, without whom the Medical Practice Act would not have been enacted

Let us not try any monkeying with the Medical Practice Act I believe very strongly that these specialties should be defined I am very much interested in that We are up against that problem all of the time I want very definite definitions of these specialists They are practitioners of medicine, and they are specialists, and they should be taken care of, but you must be exceedingly careful what you do, if you attempt anything at the present time that amends the Medical Practice Act of the State of New York, which is the best in the country

DR. THEODORE J CURPHEY, *Nassau* Despite the lateness of the hour I feel that it devolves upon me to discuss this motion I happen to be the President of the American Society of Clinical Pathologists this year and of course a member of the House of Delegates We feel very strongly about this matter Many of us have discussed it in the hospital, in the back rooms, and where have you There is a very definite question as to how the matter should be approached I admit that at the start of my indoctrination with the House here, I was entirely in favor of the approach that this motion specifies on the question of legislation giving recognition of the specialties After having knocked around with Dr Aranow and learned a few of the tricks of the legislative approach, I still feel as strongly as I did about the question, but I question seriously whether we can gain our desired ends by means of legislation Recently, it has been my studied opinion that it would be much better in the interests of medicine first, and certainly that of the four specialties, that the organized medical group consider our problem seriously and attempt to include us in their deliberations in these matters that concern our destinies I am not so certain it might not concern yours in the near future, especially if this matter of socialized medicine comes in I think that is happening I think the mere fact that as years go on the members of the four specialties are being registered by their county medical societies as having something to contribute to organized medicine, and as we are being sent in greater numbers to the House of Delegates is something I feel as Dr McGuinness does that time is running out, but apparently none of these problems can be settled by any hurried approach It appears that it is necessary to have long patience, but I want to say this, gentlemen, that while the grass grows the horse starves

DR ABRAHAM KOPLOWITZ, *Kings* I would like to be recognized, Mr Speaker

SPEAKER ANDRESEN The motion is to refer this whole matter to the Council for action Have you anything to add to that motion to refer?

DR KOPLOWITZ Well, yes, some little instruction to them It seems to me that this resolution covering something that I have been hearing now for the last fifteen or twenty years is going to accomplish nothing Why not face the facts as we know them? What we don't like is hospitals hiring these people, and not allowing them to practice That is not going to be changed by any legislation They are recognized now When they hire a pathologist, they know it is a doctor When they hire an anesthetist, they know it is a doctor Our fight is to stop them from hiring these men, and letting them practice as the rest of the profession do The legislation is entirely inadequate and will never reach it but may do harm as has been expressed

The question was called, and the motion was put to a vote and was carried

DR EGGSTON That is all I want to thank you all for your very kind treatment (*Applause*)

SPEAKER ANDRESEN Thank you, Dr Eggston.

I owe Dr Eggston an apology I hope that the Speaker next year will not refer so much to one man as we did to him this year I think he deserves great credit for what he has accomplished

I promised Dr Givan to listen to his report on Maternal and Child Welfare tonight

Section 118 (Sec 10)

Report of Reference Committee on Report of Council, Part II Maternal and Child Welfare

DR THURMAN B GIVAN, *Kings* Mr Speaker and members of the House, there were referred to our Committee some activities of your Child Welfare Committee during the past year

At the request of the New York State Department of Health a meeting of the Subcommittees on Maternal and Child Welfare was held in New York City on October 21, 1947 Members of the Council Committee on Public Health and Education, some of the officers of the Medical Society of the State of New York, and representatives of the State Department of Health were also present At this meeting the statement prepared by the New York State Department of Health regarding proposed pediatric consultation services was considered, as was the plan of the Department to have available obstetric films for postgraduate medical education

On November 12, 1947, a meeting of the Subcommittee on Child Welfare was held At this meeting the following statement prepared by the New York State Department of Health was approved by the committees

Statement Regarding Proposed Pediatric Consultation Services

The Medical Society of the State of New York and the New York State Department of Health agree on the principle that adequate pediatric consultation services should be available to general practitioners Such pediatric consultation services are primarily a technic of graduate education which will in the long run improve the quality of medical care to all the children of the State As such, it is of concern to the two organizations issuing this statement

Private practitioners should be encouraged to make greater use of pediatric consultation services. For patients who cannot obtain the needed consultation services, including indicated laboratory and x ray examinations such services should be made available to general practitioners through the instrumentality of the public health program on a regional basis radiating from a pediatric center Inasmuch as technics for providing such services have not been developed in detail it is proposed that a pediatric consultation program be instituted in a single region of the State on an experimental basis. Buffalo region has been selected for this experiment.

In the development of pediatric consultation services, major emphasis should be placed upon consultations for groups of patients in such locations that the needed laboratory and x ray examinations may be readily provided The referring physician is required and other physicians are encouraged to attend the group consultation In connection with such group consultations, teaching conferences and other educational devices should be arranged for the pediatric consultant. In view of the varying circumstances in each case, the referring physician must be the individual to determine if pediatric consultation service including indicated laboratory and x-ray examinations, is otherwise available to his patient.

Individual consultations by pediatricians have been provided to a limited extent as part of the public health program for many years. No change in policy in this regard is proposed.

At this meeting qualifications and duties of *consultant obstetrician* and *consultant pediatrician of* the Division of Maternal and Child Health of the New York State Department of Health were considered and the Committees will assist the Department in finding specialists to fill these positions.

Your Reference Committee recommends the acceptance of this report, and I so move.

DR. PETER J DI NATALE, *Genesee* I second the motion.

There being no discussion, the motion was put to a vote and was unanimously carried.

DR. GIVAN At the request of the New York State Department of Health a meeting of the Committee on Child Welfare was held in New York City on January 14 1948 The *Baby Book*, a publication of the New York State Department of Health was reviewed and *the Committee made suggestions* for changes.

The Department will include the following paragraph in the section on Acknowledgments at the end of the book 'The Council Committee on Public Health and Education the Subcommittee on Child Welfare, and other representatives of the Medical Society of the State of New York have reviewed *the Baby Book* and made many valuable suggestions They approved the use of the *Baby Book* for general public health education in New York State.

Your Reference Committee recommends the acceptance of this report, and I so move.

DR. EDWIN A. GRIFFIN *Kings* I second the motion.

There being no discussion the motion was put to a vote and was unanimously carried.

DR. GIVAN Next is the Supplementary Report concerning Child Welfare

A meeting of the Subcommittee on Child Welfare was held on March 10 1948, in New York City to discuss school health services in the State Department of Education The matter of most concern is securing a sufficient number of qualified physicians for full-time positions in the service A considerable number of suggestions for improvement in securing applicants have been submitted to the State Education Department

Another meeting of the Subcommittee on Child Welfare was held in New York City on April 6 1948 to discuss payment of consultation fees to specialists and general practitioners for services rendered to the Department and also a schedule of fees for laboratory procedures Those fee schedules were given general approval with the understanding that some changes may be recommended later

Your Reference Committee *recommends* the approval of the conclusions of your Subcommitttee on Child Welfare namely to obtain better school health services by securing a sufficient number of well qualified physicians for this service by paying them an adequate fee for services

I move the adoption of this portion of the report

DR. WILLIAM J ORR, *District Delegate* I second it.

There being no discussion, the motion was put to a vote and was unanimously carried

Section 119

Report of Reference Committee on Report of Council, Part II Diversion of Federal Funds for Pediatric Undergraduate, Graduate and Postgraduate Education

DR. THURMAN B GIVAN *Kings* The following resolution was introduced by Dr William J Orr of the Eighth District Branch, Medical Society of the State of New York

WHEREAS the American Academy of Pediatrics has now concluded a complete two and one-half year survey of pediatric education in all of the approved medical schools and the pediatric departments of all hospitals and of all other child health services including the care rendered by private physicians, state by state and county by county throughout the United States

WHEREAS this survey places the American Academy of Pediatrics in a unique position of knowing the facts related to the needs of child health services,

'WHEREAS, the Executive Board of the American Academy of Pediatrics has come to the conclusion that the first and most fruitful approach toward a national program for the improvement of child health must be predicated upon increasing and strengthening the teaching of pediatrics at the undergraduate graduate and postgraduate levels for general practitioners and pediatricians

WHEREAS a program for strengthening pediatric education will increase teaching budgets of medical schools and pediatric departments of hospitals which even now do not have adequate financial support,

WHEREAS the Executive Board of the American Academy of Pediatrics after due deliberation as to the availability of possible private sources of revenue has taken under consideration the use of Federal funds to assist these schools and hospitals in a program designed to further pediatric education

WHEREAS to this proposal for Federal funds has been added the requisite that such funds be allotted according to the judgment of nine representative pediatricians and without interference with the policies or internal affairs of the institutions concerned

"WHEREAS, the Executive Board of the American Academy of Pediatrics proposes to submit to the Congress a constructive program for child welfare based upon the findings of its survey, having thus gathered together the pertinent facts pertaining to child care and pediatric education, therefore be it

"*Resolved*, that the House of Delegates of the Medical Society of the State of New York approve the recommendation of the Executive Board of the American Academy of Pediatrics that Federal grants, such as are now available in other fields of medicine, be provided for training in the medical care and health supervision of children,

"*Resolved*, further that this resolution be introduced at the meeting of the House of Delegates of the American Medical Association in June, 1948"

Your Reference Committee approves this resolution for the following reasons

1 It is an effort to direct Governmental expenditure in support of medical education, rather than medical care

2 It offers an opportunity to develop a program in which federal funds for education are expended only on approval of a council representing organized medicine

3 The structure of this proposal is one that readily fits into an adequately safeguarded program in support of medical education in general

I move the acceptance of this report The Committee in deliberating over this quite at length asked certain members who have conducted this study from out of town to sit with us, and I would like to have the indulgence of the Chair to ask Dr John Hubbard, if he will, to give a few statements in regard to this subject of this latter resolution because he more than anyone else knows the intricacies of it He conducted the study for the Academy of Pediatrics

SPEAKER ANDRESEN Dr Givan invited Dr Hubbard up to the committee meeting, and we are very much pleased to have Dr Hubbard here If he would like to make a few brief remarks at this time, he may do so

DR. JOHN HUBBARD Mr Speaker and members of the House, I wish to thank you for extending to me the privileges of the floor I promise you that I will be brief in deference to the hour I think in a few moments I can correct some misapprehensions and perhaps some misunderstandings which may have come to your attention in relation to this measure

I heard, for example, this morning here at this meeting for the first time the statement that the Academy of Pediatrics in one of its reports stated that 90 per cent of general practitioners are not qualified to care for children I don't think that statement needs much comment except to say I am sure it was never made I certainly did not make it I don't believe it, and I don't believe any member of the Academy believes it I hope, therefore, that one can be dismissed as a rather absurd misrepresentation of facts

What we have said is from the factual information we have gathered that 75 per cent of the care of children is in the hands of the general practitioner He is the fellow that carries the load Any program, therefore, for the improvement of child health must necessarily depend upon the general practitioner The findings of the study of child health services are just now coming to light They were reported briefly at a preliminary meeting held a couple of weeks ago in Buffalo, at which there was in attendance members of the Child Welfare Committee of your State Medical Society, pediatric representatives of each of the twelve districts of the State Medical Society, chairman of the Public Health and Education Committee, and the secretary of your State Medical Society

One of the findings of the study which has been of most concern to us comes from the personal visits we have made to each of the approved medical schools throughout the United States We are gravely concerned with the inadequacies of pediatric education and of the inadequacies of financial support for pediatric education We are convinced that any program for the improvement of health services for children must begin at that point, with strengthening of pediatric education Here let me emphasize that when we say "pediatric education" we do not mean turning out more pediatricians or merely just giving better training to pediatricians, we are concerned with the physician who is carrying the load and is caring for the major part of the children, who, as I have stated, is the general practitioner This program is, therefore, essentially an effort to strengthen the hand of the general practitioner who is carrying the load for the medical care and health supervision of children

I wish to reiterate also, as was stated in the resolution, that in the event some measure for support of medical education in general should be developed favorably—and we emphasize that word "favorably"—then I am sure the American Academy of Pediatrics would be very glad to have its effort swing into that general stream

We are interested in medical education in general We are cognizant of the fact that any program for the improvement of medical education costs money We are hearing a good deal now of the crisis that is facing medical education That is not my word, "crisis" Those of you who may have attended the conference in February on Medical Education and Licensure in Chicago heard a great deal about the crisis in medical education I would refer you to several statements in the *Journal of the American Medical Association*, perhaps particularly to the May 1 issue, in which there is a good deal reported from that February meeting Therefore, any program to support pediatric education or general education must increase cost Hospitals and medical schools are now facing increasing deficits

Realizing these facts, we felt there was no recourse other than to recommend that improvement of education be handled through Federal funds, with the distinct understanding that this is something proposed by organized medicine, and that all grants for funds should be made only upon the approval of a council which we name, for lack of a better term, Council on Pediatric Education

Particularly, may I draw your attention to the wording that the recommendation is for Federal grants such as are now available in other fields of medicine, that they be provided also for the training in the medical care and health supervision of children In other words, there is now being spent under the United States Public Health Service $1,000,000 in teaching grants, especially earmarked for mental health, another $1,000,000 is being spent in teaching under the Cancer Program, the Children's Bureau is allocating through State health departments approximately $1,000,000 in support of teaching salaries These grants are not being made with the approval of any group representing organized medicine We propose in the further development of this program these grants should be

made with the approval of a council representing organized medicine.

If such a measure is conducted favorably, I think without question the medical profession will have taken a strong move toward the support of medical education rather than medical care

I have been rather interested to note that one of the sources of criticism which we have received in relation to this program is from those who believe that this program is a direct move against compulsory health insurance.

Thank you sir!

DR. THOMAS A McGOLDRICK, *Past President.* Hardly any physician would take exception to the objects of this report and the statements made by Dr Hubbard as the result of his study for the past two and one-half years Hardly any physician has an objection to the wider diffusion of knowledge, whether it is in pediatrics or in any other branch and with all of those objects and purposes of teaching in the medical schools better teaching in the hospitals, and increased knowledge obtained by the general practitioner I would, with everybody else be in full accord But there is one little point in there that with our experience of the years does not sound just as smooth nor as subtle as it might be the contribution of the Federal Government to parts of medicine

There may be ways in which that can be controlled but the person that gives the money in accordance with all of the practices of the United States retains a hold on them He advocates and makes standards That has been true in all of those branches venereal disease, tuberculosis and you remember what they wished for neuropsychiatric diseases of a few years ago when the Public Health Service asked to have the control of the diagnosis, the treatment, and hospital care of all of those cases and there were 51 per cent of all of the beds in the United States occupied by neuropsychiatric cases

I am sure that the United States Government will not, unless some new law is enacted turn over money and let a council of doctors take charge of the distribution of it They have not as yet done that We know what the government is doing with the doctors. We heard today about the Veterans Administration and what is happening there with the choice of private physician and how it worked out with the abrogation of the authorities.

Last April or July as our memories will serve $202 000 was paid for medical services and then as the new men came along by March of this year the total amount of services rendered by the medical profession as approved by the Government directive was $11 000 that will be directed properly into those government channels.

I feel that when the Government is going to give money to pediatrics either in schools or in methods to educate the general practitioner or in laying out plans for improvement in hospital services and their pediatric departments they will retain their hold by means of standardizing and directing and control of that money to be taken from or increased at any time by the Government itself While in hearty sympathy with all of the purposes and objects of the pediatric department I feel that unless there is some way in which money may be given for these purposes outright and free and clear of all government control, which is well nigh an impossibility—I mean Federal Government control—we should not approve of this under those circumstances

DR. JAMES F ROONEY *Trustee* There is an old maxim that he who pays the fiddler calls the tune. We have had our experience with it, and here so far as I know is the first time that the medical profession is going to the Federal Government and saying 'Give us money Our position in opposition to all of the plans for the nationalization of medicine and socialization of medicine immediately is broken down. Our argument breaks when we say we come asking for education and I dread to see the trend in education not alone medical but national uniform elementary and collegiate, placed in the hands of the Federal Government which is definitely what they want to do I have no trust in any of it. I have no confidence, particularly in the Social Security Administration

We know what happened during the war in relation to the obstetric provisions put out by the Children's Bureau We know exactly how false statements were made repeatedly by the director of that Bureau. We know that constantly every man who has had experience—if Dr Kosmak is here, he can state what the experience was with that—knows what happened

Gentlemen I hope that we will not. I would much rather we put on a begging campaign among ourselves I am in favor of more education of every sort but I am absolutely fearful at seeing the rate of conversion of this Government to a socialized totalitarian government being aided by ourselves

SPEAKER ANDRESEN Is there any further discussion?

DR. THOMAS M D'ANGELO *Queens* I would like to ask a question I would like to ask what department of the Federal Government is going to have the power to give out this money

SPEAKER ANDRESEN Do you want to answer that question, Dr Givan?

DR. GIVAN That has not been determined as yet because the money has not been asked for as yet. In the second place we have hopes that it will come through the Educational Department, but there is no way of knowing that particular thing

DR. ROONEY May I ask another question? Is this the first time that this resolution has been presented to any body of delegates of organized medicine? Is this, its presentation in this House the first presentation that has been made in the United States to organized medicine?

DR. GIVAN It is.

DR. D'ANGELO Since my question was answered I would like to make this motion that since this matter is in a continuous state of flux I move that it be referred to the Council for their study

DR. ROONEY I second the motion.

SPEAKER ANDRESEN The discussion now would be on the motion to refer the matter to the Council for study

DR. THOMAS F McCARTHY *Bronx.* I want to discuss the original motion.

SPEAKER ANDRESEN We are discussing the motion to refer

DR. McCARTHY I asked for the floor before that motion was put. I thought you were going to recognize me for you were looking right at me

SPEAKER ANDRESEN If you want to discuss the motion to refer please do so.

DR. McCARTHY Speaking for the Bronx County Delegation we are opposed to the original motion and we would also be opposed to the motion of referral to the Council on the basis that we are opposed to the request for Federal interference in education and the allocation of funds from the Federal Government, except with the consent and direction to the states and the local communities involved.

Secondly, there were a couple of other questions asked which shed much light on this subject, but when the speaker mentioned organized medicine, I think of organized medicine, as we do here, as being the American Medical Association, the state societies and the county societies, so we question whether nine men from, say, the Academy of Pediatrics, are representatives of organized medicine Therefore, we would even oppose the motion to refer to the Council

DR. ROONEY May I have the consent of the House for a moment? As I recall it, we were requested to introduce a resolution of this sort into the House of Delegates of the American Medical Association at their coming meeting with our approval of this plan Am I in error in that?

DR. GIVAN That is correct

DR. ROONEY Gentlemen, I still feel that instead of taking hasty action upon this thing that the motion to refer is absolutely correct I can assure this House that there will be neither hasty, nor untoward action, nor action in error, taken by the Council of your Society I hope the motion to refer will pass

The question was called, and the motion was put to a vote and was carried.

Section 120

Report of Committee of Whole

SPEAKER ANDRESEN There is one thing we have to do now We neglected before to get the report of the Committee of the Whole, which I am now going to ask for I am going to call on Doctor Strohm to report on the Committee of the Whole

VICE-SPEAKER STROHM This report will not be in detail for several reasons, but I will try to summarize the work that was done by the Committee of the Whole

The first business taken up was the Report of the Reference Committee on Malpractice Insurance and Defense Board by Dr Koplowitz The resolutions were some three in number Considerable information was given concerning the work that the Malpractice Insurance and Defense Board had done during the year We were favored with a very technical report by an actuary on the insurance problems involved, and it was recommended that the Board be continued

During the discussion of this report a resolution of Dr Wetherell's was also discussed, all of which recommendations and resolutions of this Reference Committee were approved

Dr Bauckus then reviewed the Veterans Administration activities that he is interested in as President of the Veterans Medical Service Plan, Inc , and as chairman of the Council Committee of Liaison with the Veterans Administration This was followed with a great deal of information, and the report was finally adopted as reported by Dr Bauckus

A discussion on cults was called for, and Dr Eggston, chairman of the Reference Committee on Report of the Council, Part IX, reported on some resolutions pertaining to cults that had been referred to his reference committee Dr Dattelbaum, chairman of the Subcommittee on Cults, gave us considerable information, and after a prolonged discussion the report of the Committee was approved That report was to disapprove some of these resolutions

Dr Eggston also reported as chairman of the Reference Committee on Report of the Council, Part IX, on the legislative report, and that was approved as read

Dr Rawls, chairman of Miscellaneous Business B Reference Committee, which dealt with certain changes in the American Medical Association's bylaws which seemed to sort of discriminate as to certain racial groups made suggestions for change of this bylaw, I believe it is Article 4, which was finally adopted as reported by him

Dr Geis, chairman of the Reference Committee on Part of the Council, Part XII, then reported concerning Nursing Education His final report was adopted by the Committee of the Whole

Dr Geis also reported on the Wicks' Committee recommendations with amendments, and the report of his reference committee was referred to the Council for proper action

I think that is all

Vice-Speaker Strohm moved that the report be accepted

DR JAMES F ROONEY I second the motion that the report be accepted

There being no discussion, the motion was put to a vote and was unanimously carried

DR. JAMES R. REULING, *Treasurer* Because there was a great deal of informative material as presented by Mr Linder, the actuary, who made the report, I would move that the report of the Malpractice Defense and Insurance Board and the discussion thereon, as well as the report of the actuary, be incorporated in the minutes of the House of Delegates in toto

DR. JAMES F ROONEY I second the motion that the report be accepted

There being no discussion, the motion was put to a vote and was unanimously carried

DR. CHARLES F MCCARTY, *Kings* I move that the reports of Dr Geis and Dr Rawls given during the executive session be printed in the minutes

SECRETARY ANDERTON Also portions of Dr Eggston's report

DR MCCARTY Yes

DR THEODORE J CURPHEY, *Nassau* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

SPEAKER ANDRESEN I would like to announce that tomorrow morning at nine o'clock sharp we will have the election of officers We are going to have an awful lot of work still to do with reference committees, so if we don't get started promptly, we may not get through.

Dr McCarty asks me to have you all register for voting at the table when you come in

DR. MCCARTY The table outside

SPEAKER ANDRESEN Register outside at the table before you come in You must so register before you can vote We will start right on time tomorrow morning, at nine o'clock, so please be promptly in your seats at that time

This session is now adjourned

The session adjourned at 7 15 P M

Morning Session

May 19, 1948

The session convened at 9 00 A.M

SPEAKER ANDRESEN The House will be in order I have a few announcements to make The first is to again remind you to get your tickets for the banquet out in the hall

The second is to attend the technical exhibits

about which I have spoken to you before.

Third I want to announce a Council Meeting following immediately after adjournment of the House, and that is to be followed by a meeting of the Board of Trustees both in Rooms 111 and 112

Section 121

Elections

SPEAKER ANDRESEN We now come to elections of officers. Is there a quorum present, Mr Secretary?

SECRETARY ANDERTON Yes I believe there is

SPEAKER ANDRESEN Will the Secretary read the names of the tellers? We would like each teller to answer to his name. If he does not answer we will have to get another teller to act in his place because we want to get going right away

The following list of tellers was finally appointed

Charles F McCarty *Chairman Kings*
Irwin Nelson *Allegany*
Charles L. Pope, *Broome*
Samuel Gitlow *Bronx*
Alexis Leonidoff *Dutchess*
Edwin A Griffin, *Kings*
Charles Gullo, *Livingston*
Eugene H Coon, *Nassau*
B Wallace Hamilton, *New York*
Arthur F Gaffney *Oneida*
James Greenough *Otsego*
Donald R McKay *Erie*
Porter A. Steele, *Erie*
Norman S Moore, *Tompkins*
John J Gainey *Kings*
Reginald A. Higgons, *Westchester*
Frederick W Williams, *Bronx*
Teresa McGovern, *New York*
Harold B Davidson, *New York*
Moses Krakow, *Bronx*
Louis Berger *Kings*
Peter M Murray, *New York*
Howard Dodds, *Oneida*
W Alex Newlands, *Westchester*

SPEAKER ANDRESEN Will these tellers, whose names were just read off as soon as they are through voting, go through the door to the side where they will reach the bridge, and where the votes will be counted

Section 5 of Chapter III of the Bylaws provides

'In the event of a single nominee only for any office a majority vote without ballot shall elect.'

The Chair will entertain a motion in such case for closing the nominations and declaring the candidate elected. That will save us some time

The ballots will be distributed. They are to be filled out only with the names where there are any disputed offices, where there is more than one name nominated, and in the case of the delegates to the American Medical Association we have to vote for ten, but twenty names will have to be presented

NOMINATIONS AND ROLL CALL

Nominations were received

Assistant Secretary Frey read the following list of those who were entitled to vote

OFFICERS COUNCILORS, AND TRUSTEES

Louis H Bauer
Leo F Simpson
Ralph T. B. Todd
W P Anderton
W Guernsey Frey Jr
James R. Reuling
Fenwick Beekman
Albert F R Andresen
Nelson W Strohm
Albert A. Gartner
O. W H Mitchell
Maurice J Dattelbaum
Dan M Ilen
Carlton E. Wertz
Christopher Wood
Charles M Allaben
Floyd S. Winslow
J Stanley Kenney
Harry Aranow
William H. Ross
John J Masterson
Edward R. Cunniffe
James F Rooney

EX PRESIDENTS

Allen A Jones
Martin B. Tinker
Thomas H Halsted
James F Rooney
(registered as Trustee)
Arthur W Booth
Orrin Sage Wightman
Nathan B. Van Etten
Harry R. Trick
William H Ross
(registered as Trustee)
William D Johnson
Chas Gordon Heyd
Arthur J Bedell
Floyd S. Winslow
(registered as Councilor)
Samuel J Kopetsky
George W Cottis
Thomas A McGoldrick
Herbert H. Banckus
Edward R. Cunliffe
(registered as Trustee)

DISTRICT DELEGATES

Harold F Morrison
John B. D'Albora
Frederic W Holcomb
Denver M Vickers
H. Dan Vickers
Ivan N Peterson
Lloyd F Allen
William J Orr

SECTION DELEGATES

E. Williams Abramowitz
Rudolph V Gorsch
Philip L. Forster
Thomas H McGavack
Milton G Potter
Maxwell D Ryan
Halford Hallock
Stephen H. Curtis
H Burton Doust
Frederic E. Elliott
Stanley E. Alderson
William J Kennedy
Harold C. Kelley

COUNTY SOCIETY DELEGATES

Albany (3)
Raymond F Kreiber
Irvin E. Gage
Christopher Stahler Jr

Allegany (1)
Irwin F Isen

Bronx (18)
J Lewis Amster
Renato J Azzari
Edward P Flood
Anthony C Gallucclo
Goodlatte B Gilmore
Samuel Gitlow
William Klein
Moses H Krakow
Frank LaGattuta
Thomas F McCarthy
John L. O Brien
Frederick W Williams
Frederick A Wurshach Jr

Broome (3)
Elton R. Dickson
Charles L. Pope
Charles D Squires

Cattaraugus (1)
Leo E. Reimann

Cayuga (1)
Alfred K. Bates

Chautauqua (2)
Edgar Bieber
Charles E. Goodell

Chemung (1)
William T Boland

Chenango (1)
J M tt Crun b

Clinton (1)
Leo F Sch ff

Columbia (1)
J hn L. Edward

Cortland (1)
John E. Wattenberg

Delaware (1)
Orrin Q Flint

Dutchess (3)
Donald Malven
Alexis Leonid ff
Scott Lord Smith

Erie (8)
John T Donovan
Arthur F Glaeser
Harry C. G rse
Donald R. McKay
John D Naples
Joseph C. O Gorman
J Frederick Painton
Porter A. Steele

Essex (1)
Joseph A Geis

Franklin (1)
Daisy C. H Van Dyke

Fulton (1)
Sylvester C. Clemans

Genesee (1)
Peter J Di Natale

Greene (1)
Kenneth F Bott

Herkimer (1)
George A Burgin

Jefferson (1)
J E. McAskill

Kings (24)
Charles A. Anderson
Louis Berger
Benjamin M Bernstein
Ban A. B rkow
Th mas M Brennan
Leo S. Drexler
John J Gainey
Thurman B. Givan
Edwin A. Griffin
Abraham Koplowitz
Aaron Kottler
Charles A. Loughran
A W Martin Marino
Charles F McCarty
Donald E. McKenna
Charles W Moeller
Abraham M Rabiner
Irving J Rinde
Sol mon Schussheim
Leo S. Schwartz
Irwin E. Sid
Elnar A Smoke
Joseph Tenopyr
Thomas B Wood

Lewis (1)
Thomas A. Lynch

Livingston (1)
Charles Gullo

Madison (1)
Felix Ottaviano

Monroe (5)
Benjamin J Duffy
John J Finigan
Joseph P Henry
Charles S. Lakeman
John L. Norris

Montgomery (1)
Rene H Juchli

Nassau (5)
Eugene H Coon
Theodore J Curphey
John M Galbraith
E Kenneth Horton
Austin B Johnson

New York (24)
Philip D Allen
Horace E Ayers
J Homer Cudmore
Samuel B Burk
Burrill B Crohn
Harold B Davidson
A Wilbur Duryee
Edward P Eglee
Leone M Cottrell
Samuel Z Freedman
B Wallace Hamilton
Alfred M Hellman
Stratford C Wallace
Margaret Janeway
David Lyall
Arthur M Master
Madge C L McGuinness
Samuel W Moore
Peter M Murray
Charles Muzzicato
James L Pool
William B Rawls
Teresa McGovern
William C White

Niagara (2)
William A. Peart
Guy S Philbrick

Oneida (3)
Ralph H Dodds
Arthur F Gaffney
John F Kelley

Onondaga (4)
Leo E Gibson
Dwight V Needham
W Walter Street
Frederick S Wetherell

Ontario (1)
Homer J Knickerbocker

Orange (3)
M Renfrew Bradner
Walter W Davis
Moses A Stivers

Orleans (1)
John Dugan

Oswego (1)
John J Mowry

Otsego (1)
James Greenough

Putnam (1)
Henry W Miller

Queens (12)
Alfred Angrist
Erwin Beckhard
Frank J Cerniglia
Thomas M D Angelo
Arthur A Fischl
Benjamin F Glasser
Joseph D Hallinan
Vincent Juster
Sol Axelrad
Francis G Riley
Jacob Werne
Ezra A Wolff

Rensselaer (2)
Eugene Hanratta
Richard P Doody

Richmond (2)
D V Catalano
W T Heldmann

Rockland (2)
Stephen R Monteith
E Armand Scala

St Lawrence (1)
L T McNulty

Saratoga (1)
Joseph L Kiley

Schenectady (2)
Joseph H Cornell
Charles F Rourke

Schoharie (1)
David W Beard

Schuyler (1)
C W Ehrenstein

Seneca (1)
Stanley B Folts

Steuben (1)
William J Tracy

Suffolk (5)
Wilbur S Stakes
Cyril E Drysdale
John L. Sengstack

Sullivan (1)
Harry Golembe

Tioga (1)
Harry S Fish

Tompkins (1)
Norman S Moore

Ulster (1)
Eugene Galvin

Warren (1)
Morris Maslon

Washington (1)
Walter S Bennett

Wayne (1)
S W Houston

Westchester (6)
George C Adie
Andrew A. Eggston
Edwin L. Harmon
Reginald A Higgons
Henry E McGarvey
W Alex Newlands

Wyoming (1)
G Stanley Baker

Yates (1)
E Carlton Foster

ELECTION OF OFFICERS, TRUSTEES, AND COUNCILORS

The following officers were elected for one year

President-Elect, John J Masterson, *Brooklyn*
Second Vice-President, Theodore J Curphey, *Garden City*
Secretary, W P Anderton, *New York*
Assistant Secretary, W Guernsey Frey, Jr, *New York*
Treasurer, James R Reuling, *Bayside*
Assistant Treasurer, Fenwick Beekman, *New York*
Speaker, Albert F R Andresen, *Brooklyn*
Assistant Speaker, Nelson W Strohm, *Buffalo*
Trustee for Five Years, Albert A Gartner, *Buffalo*
Trustee for Two Years, Edward T Wentworth, *Rochester*
Councilors, O W H Mitchell, *Syracuse*, Maurice J Dattelbaum, *Brooklyn*, Dan Mellen, *Rome*

ELECTION OF A M A DELEGATES

The following were elected 1949–1950 delegates W P Anderton, *New York*, Albert F R Andresen, *Brooklyn*, James R Reuling, *Queens*, Floyd S Winslow, *Monroe*, Herbert H Bauckus, *Erie*, O W H Mitchell, *Onondaga*, Thomas M Brennan, *Brooklyn*, Ralph T B Todd, *Westchester*, Albert A Gartner, *Erie*, William B Rawls, *New York*

The following were elected 1949–1950 alternate delegates Edward P Flood, *Bronx*, Leo F Schiff, *Clinton*, W Guernsey Frey, Jr, *New York*, B Wallace Hamilton, *New York*, Clarence G Bandler, *New York*, Denver M Vickers, *Washington*, John L Edwards, *Columbia*, John T Donovan, *Erie*, Walter T Heldmann, *Richmond*, Eugene H Coon, *Nassau*

Section 122

Election to Honorary Membership

SECRETARY ANDERTON Mr Speaker, the following letter has been received from the Officers of the Medical Society of the County of Kings under date of April 20, 1948

Dear Doctor Anderton

In accordance with your letter of April 16 we as members of the Medical Society of the County of Kings and Academy of Medicine of Brooklyn wish to recommend Dr Robert F Barber of Farmingdale New Jersey to Honorary Membership in the Medical Society of the State of New York

Dr Barber was an active member of the Medical Society of the County of Kings from June 20 1911 to December 31 1947 and was elected to Honorary Membership in the Society on February 17 1948 He resigned from active membership December 31 1947 when he moved to Farmingdale New Jersey where he now resides

Very truly yours
A W Martin Marino
Charles H Loughran
Charles F McCarty

This is nominating Dr Robert F Barber to perhaps one of the highest honors that we can pay any member in our profession

DR MAURICE J DATTLEBAUM, *Kings* I move it

DR EDWIN A GRIFFIN, *Kings* I second it

SPEAKER ANDRESEN It is open for discussion It requires a two-thirds vote I believe, Mr Secretary?

SECRETARY ANDERTON I would have to look that up

SPEAKER ANDRESEN I am sure it does

There being no further discussion the motion was put to a hand vote and was unanimously carried

SPEAKER ANDRESEN Dr Robert F Barber is declared elected an Honorary Member

Section 123

Transfer from Retired to Active Membership

SECRETARY ANDERTON A letter was received from Dr G B Gilmore, secretary of the Bronx County Medical Society, under date of April 28, 1948, reading

Dear Dr Anderton

Dr William Hinz 1882 Grand Concourse who was made a retired member of the State Society in 1941 returned to the practice of medicine this year

Will you kindly request the House of Delegates to rescind the action on this retirement and replace Dr Hinz s name on the active membership roster

Sincerely yours,
G B Gilmore, M D
Secretary

I move, sir, that the retired membership accorded to Dr William Hinz be rescinded and that he be returned to active membership in the Society

DR. G B GILMORE *Bronx.* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

SPEAKER ANDRESEN He is declared elected back to regular membership

Section 124

Election of Retired Members

SPEAKER ANDRESEN We now have the election of a number of Retired Members

SECRETARY ANDERTON First there is a letter from the Officers of the Medical Society of the County of Kings, under date of April 21, 1948 reading

Gentlemen

This certifies that Dr Walter D Ludlum, Sr of 169-30 116th Avenue St. Albans Long Island New York, is an honorary member in good standing of the Medical Society of the County of Kings He was an active member for over forty years 1901 to 1942 and in 1931 was President of the Society

He is hereby applying for Retired Membership in the State Society

Yours very truly
A. W Martin Marino M D
President
Charles H Loughran, M D
Secretary

Mr Speaker, it gives me pleasure to nominate Dr Walter D Ludlum Sr for retired membership in our Society Dr Ludlum was for years a member of this House and has not only been an active member in the doings of the State Society but has been very active in his county society for a lifetime I feel he deserves retired membership if anybody does

DR. FREDERICK W WILLIAMS, *Bronx.* I second it.

There being no discussion the motion was put to a vote and was unanimously carried

SPEAKER ANDRESEN Dr Walter D Ludlum Sr is declared elected a Retired Member

SECRETARY ANDERTON Mr Speaker I move that the dues of the following gentlemen for 1947 be remitted

Ernest M Fuld *Bronx*
Alfred W Jackson *Albany*
Frederick M Miller *Utica*
Augustus B Santry *Little Falls*
Albert Van Vranken, *Skaneateles*
Charles L. Wakeman, *Hancock*

I make that motion because they would then be eligible for election to retired membership I think their dues for 1947 have not been paid Unless they are paid or rescinded by the State Society they would not be eligible for retired membership

DR. STEPHEN H CURTIS, *Section Delegate* Is it proper to add another name to this list at this time?

SECRETARY ANDERTON I believe nominations for retired membership and requests for rescinding of dues come properly from a county society Doctor, and I don t believe that an individual has the right to do that I am not quite positive, but that would be my feeling that such a suggestion would have to be voted on by the local comitia minora.

DR. JAMES R REULING *Treasurer* I second the motion

There being no discussion, the motion was put to a vote and unanimously carried.

SPEAKER ANDRESEN These men are now eligible for retired membership

SECRETARY ANDERTON Yes.

SPEAKER ANDRESEN We now have to vote on a list of members who are proposed for retired membership which is published in the *Bulletin*, so we won't waste time reading the whole list as much as we would like to hear their names It is on page 6 in your blue book, but there are more to be added, in addition to the six names that Dr Anderton just gave as follows

Gerard H Cox *Saranac Lake*
Angelo D Alfonso *Pasadena California*
Gilbert D Dare, *Plattsburg*
John Dugan *Albion*
John R. Evers, *Wentworth New Hampshire*
Frank O Garrison, *Campbell*
John D George, Sr., *Verona*
B Cordelia Hathaway *East Greenbush*
Charles E. Haynes, *New York City*
George H. Humphreys *Jamaica*
Frank H Hurst *Schenectady*
Arthur M Johnston *Utica*
Israel O Kassow *Bronx*
Melchiore Lombardo *Brooklyn*
Herman F McCheeney *Forest Hills*
Abraham Pezzler *Bronx*
William B Roemer, *Utica*
John F Timpee *Richmond Hill*
Casilus H. Watson *Brookfield Center Connecticut*
Floyd E. Woodhouse *Elmira*

If there is no objection on the part of the House the members whose names are listed in the book, with the additions I have just read and those read by Dr Anderton whose dues have just been rescinded for 1947, will be declared elected Retired Members Hearing no objection, it is so ordered

The complete list referred to is as follows

Ralph N Abels *Jersey City New Jersey*
Jules Leon Blumenthal, *New York City*
George T Boychoff *Solvay*
Paul B Brooks *Altamount*
Charles M Burdick, *Plattsburg*
Charles F Collins, *New York City*
Gerard H. Cox *Saranac Lake*
Hugh M Cox, *New York City*
Nelson A Craw *Fo kald C nnecticut*
Angelo D Alfonso, *Pasadena Cal fornia*
Gilbert D Dare *Plattsburg*
James C. Davis *Rochester*
Willard J Denno *New Yo k City*
Francis E. Du Bois, *Winter Park Florida*
John Dugan, *Albion*
Thomas F Dublieg, *New York City*
Henry Bage Dunning, *New Canaan, Connecticut*
Simon D Ehrlich, *New York City*
John R. Evers, *Wentworth, New Hampsh re*
Charles A. Falton *Syracuse*
William M Findley, *New York City*
Andrew G Foord *Kerhonkson*
Francis V Foster *Caledonia*
Howard Fox, *New York City*
Louis A. Friedman, *New York City*
Ernest M Fuld *Bronx*
Frank O Garrison, *Campbell*
John D. George, S Verona
Ernest W Goode *New York City*
Harry Greenstein, *B onx*
T Stuart Hart, *New York City*
B Cordella Hathaway *East Greenbush*
Charles E. Haynes, *New York City*
Royal Storrs Haynes, *New York City*
Richard A. Henderson, *Brooklyn*
Louis M Hickernell *Westbrook, Connecticut*
George H Humphreys, *Jamaica*
Frank H Hurst, *Schenectady*
Abbott T Hutchinson, *Coco ut Grove Florid*
Alfred W Jackson, *Albany*
Lawrence Jacobius *New Yo k City*
Curtis N Jameson, *Rochester*
George J Jennings *Bassen*
Arthur M Johnson, *Utica*
Israel O Kassow *Bronx*
Frank H Knight, *Wall Plai n*
Ernestine O Kuhr *New York City*
Charles I Lambert *Katonah*

Samuel A. Lewin *Staten Island*
Elton G Luttell *Yonkers*
Melchiore Lombardo *Brooklyn*
Herman F McChesney *Forest Hills*
Thomas H McClintock, *Brooklyn*
Warren C McFarland *Warwick*
Frederick H Meichner *Long Island City*
Howard V Merrell *Brooklyn*
John M Mesmer, *Buffalo*
Oscar N Meyer, *Middletown*
Frederick M Miller *Utica*
Frederick L Mosser *New Rochelle*
John M Nicklas *Saranac Lake*
Max Nisselson, *New York City*
Alfred T Osgood, *New York City*
Albert W Page *White Plains*
Alfred H Parsons *Great Neck*
Abraham Pemsler *Bronx*
Franklin Plumley *Rochester*
Charles H Richards *Dunkirk*
John S Richards *Goshen*
Edward S Rimer *New York City*
Solomon Rottenberg *Far Rockaway*
William B Roemer *Utica*
Ralph R Ryan *Scarsdale*
Frederick R. Sanborn, *Long Island City*
Augustus B Santry *Little Falls*
Mary B W Sanford *Cleveland Ohio*
John P Schneble *Woodhaven*
Hugo Schueller *New York City*
Herbert B Smith *Corning*
Floyd L Spaulding *Cohocton*
Frederick E Squires *Livonia*
Nathan N Stark *New York City*
Isaac P Stark *Brooklyn*
Arthur Stein *New York City*
George H Stephens *Syracuse*
Michael D Stevenson *Albany*
Jeremiah H Sullivan *Rochester*
John M Swan *Rochester*
John F Timmes *Richmond Hill*
Percy R Turnure *Northport*
Albert Van Vranken *Skaneateles*
Louis A Van Kleeck *Manhasset*
Charles L Wakeman *Hancock*
Louis T Waldo *Rochester*
Ralph F Ward *New York City*
Cassius H Watson *Brookfield Center Connecticut*
Horatio B Williams *Woodstock*
Henry C Williamson *New York City*
Floyd E Woodhouse *Elmira*

Section 125

Remarks by President-Elect

SPEAKER ANDRESEN It is now my great pleasure to present to you a couple of your new officers I will ask Dr McGoldrick if he will escort Dr Masterson to the rostrum

The delegates arose and applauded as Dr Thomas A McGoldrick escorted Dr John J Masterson to the rostrum

DR JOHN J MASTERSON, *Kings* It is very difficult on an occasion of this kind to refrain from making other than trite remarks, but I do want you to know that the Medical Society of the County of Kings and I feel highly honored, deeply appreciative, and sincerely thankful for your confidence and trust in electing one of its members to the highest office at your command in the second largest medical society in the world

The world is in a state of flux, and so is medicine We have many problems confronting us, and we will have those problems in the future To the solution of those problems we should bring the best statesmanship and wisdom at our command My long association with this House has made me very cognizant of the responsibilities and duties of this office They are beyond the capabilities of any one man I approach them with deep humility, and I hope with the helpful assistance and cooperation of this House, the Council, the Board of Trustees, the other officers, and our very efficient office staff to be able to carry on in a manner comparable to the high standards set by my distinguished predecessors in this office

I thank you very much

Section 126

Remarks of Vice-President

SPEAKER ANDRESEN I will now ask Dr Bauer to present Dr Curphey, our new vice-president

The delegates arose and applauded as Dr Louis H Bauer escorted Dr Theodore J Curphey to the rostrum

DR. THEODORE J CURPHEY, *Nassau* As I understand it, in any democracy the vice-president is usually expected to sit by and say little I propose to adopt the same policy I shall try to be a good Throttlebottom

Section 127

Report of Prize Essay Committee

SPEAKER ANDRESEN We will now have the Report of the Prize Essay Committee, of which Dr Chas Gordon Heyd is the chairman Dr Anderton will read Dr Heyd's report

SECRETARY ANDERTON Dr Heyd had to go, so he asked me to read the report of the Prize Essay Committee Of the two essays submitted this year, neither was felt to be worthy of the prize However, one was felt to be deserving of honorable mention, the one by Ex Obscuris Lux, Dr Sylvan Bloomfield The other paper submitted, "Parotid Body Tumors," there was no comment upon

SPEAKER ANDRESEN This is for our information Is the chairman of the Scientific Awards Committee here?

There was no response

SPEAKER ANDRESEN Dr Post was supposed to have a report this morning of the prizes awarded for scientific exhibits We will probably hear from him later on

Section 128

Vote of Thanks to Scientific Program Committee Also Scientific Exhibits, Convention, Program and Arrangements Committees

DR JOHN B D'ALBORA, *District Delegate* I am sure this House of Delegates appreciates the very fine program that the Scientific Program Committee has given us under the chairmanship of Dr Duncan Clark Mr Speaker, I move that we give Dr Clark and his Committee a vote of thanks for the splendid work they have done

The motion was seconded, and as there was no discussion, it was put to a vote and was unanimously carried

PRESIDENT BAUER It seems to me that in that vote of thanks we should also include the chairman of the Scientific Exhibits Committee, Dr Hiss, the chairmen of the Convention, Program, and the Arrangements Committees, as well as the others that have made this program a success I would move that they also be given a vote of thanks from the House

SPEAKER ANDRESEN I had that all provided for

The motion was seconded, and as there was no discussion it was put to a vote and was unanimously carried

SPEAKER ANDRESEN We will now have an opportunity to get back to our Reference Committee Reports We still have many reports to listen to

I wish now to call the attention of the House to the arduous tasks performed by these committees At my suggestion, practically every one of their chairmen studied the reports upon which they were to re-

port, when they were published in the April 1 issue of the JOURNAL, wrote out tentative reports and sent them to the members of their committees for comments, so that they could give more time here to hearings and to new reports and resolutions referred to them Several of these committees met a week or two in advance of the meeting to get their reports in order Some asked for outside help at their deliberations Their excellent reports yesterday showed the good results of this preparation, and we hope for even better results next year

The few reports which held us up yesterday were due to the fact that the Council Committee reports had not been presented on time and we hope that this will not occur again next year

In spite of all of this preparation the many important matters which were discussed so lengthily yesterday have given us a tremendous backlog of reports still to be considered. We may be busy well into the afternoon It has become evident that there is too much work in the House to permit us as doctors to take part in the scientific work of the meeting It has been suggested that, like the American Medical Association we have an interim session in the winter so that we will not have so much work at the annual session This would require an amendment to our bylaws and in order to have an amendment to the bylaws it is necessary for an intention to amend the bylaws to be presented at *this* time.

I believe Dr Rooney wishes to have the privilege of the floor which requires a two-thirds vote on this day I will call for a show of hands to permit Dr Rooney to present this motion to facilitate our meetings in the future.

There were no negative votes cast.

SPEAKER ANDRESEN Dr Rooney you have the floor

Section 129

Notice of Intention to Amend Bylaws to Provide for one Extra Meeting of House Each Year

DR JAMES F ROONEY *Trustee.* I hereby give notice that I propose to amend the bylaws to provide for one additional meeting of the House of Delegates in each year I will present the written notice and the proposal before the closing of this session

SPEAKER ANDRESEN This constitutes a notice of the proposed *amendment which will have to be* published one month before the next annual meeting in order to be adopted at that meeting

Section 130

Advisability of Holding Special Meeting of House in 1948.

SPEAKER ANDRESEN I would like to ask Dr Rooney now whether he would make a motion requesting the Council to consider the advisability of calling a special meeting of the House next winter It will have value to us now to know the feeling of the House in regard to such a meeting.

DR. ROONEY I will be very glad to make the motion, Mr Speaker, but I am not a member of the Council, and I think it might be well perhaps to have that notice given or at least have my motion seconded by a member of the Council I am just on the Board of Trustees.

DR. FLOYD S WINSLOW *Councilor* I will second it.

SPEAKER ANDRESEN *Is there any discussion?* That does not require any amendment to the by laws.

DR. ROONEY That is right.

It was put to a hand vote and was unanimously carried.

SPEAKER ANDRESEN This is merely a suggestion to the Board of Trustees and Council to consider the matter and it is the sense of the House apparently that we are in favor of such a meeting

Are there any other matters to come up before we go on with the Reference Committee Reports?

There was no response.

SPEAKER ANDRESEN If not, we will continue with the Reference Committee Reports.

Section 131 (*See 44 79*)

Report of Reference Committee on Report of Council Part XI Publication of Articles on Subject of Medicine

DR. THEODORE J CURPHEY *Nassau* Your Reference Committee has considered the resolution submitted by Seneca County in connection with the resolution adopted by this House at its 1947 Convention directing all members to seek official approval of the Society for the publication of any article on the subject of medicine written by a member of the Society for the lay press whereby it considers such a motion a forthright violation of the basic principles of free speech and freedom of press Your Reference Committee consulted with the *Chairman of the Reference Committee on Report of* the Council Part XII who will report on the joint action of this motion

That part of the resolution of Seneca County petitioning the House to expend its energy in the matter of censoring publications in the direction of those individuals who write pseudoscientific papers which are misleading or contrary to established scientific truths, or whose articles are dedicated to the purpose of tearing down the traditions and the high standards of our profession, was also considered by your Committee. It expresses its sympathy with the views expressed therein, but feels that it is beyond the jurisdiction of this Society to take action on *this part of the motion*

I move the adoption of this part of the report.

DR. FREDERICK S WETHERELL, *Onondaga* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 132 (*See 16 17 133 134*)

Report of Reference Committee on Report of Council Part XI Directory

DR. THEODORE J CURPHEY *Nassau* On discussion with members of the Publication Committee and review of their report in the NEW YORK STATE JOURNAL OF MEDICINE of April 1 1948 and their supplementary report of May 12 distributed at this meeting, certain facts emerged

1 That the new edition of the *Directory* will not be ready until about January 1949

2 That the deficit sustained in the 1947 *Directory* was $59 395

3 That the estimate for the coming volume is in the neighborhood of $63 000

In view of the foregoing facts and others that need not be discussed at this time It is the recommendation of your Reference Committee that in the interests of economy of operation, following the next edition of the *Directory* a subsequent edition be published at no more frequent an interval than two years

I move the adoption of this part of the report.

DR JAMES F ROONEY, *Trustee* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

Section 133 (*See 16, 17, 132, 134*)

Reports of Reference Committee on Report of Council, Part XI Publication of the "Journal"

DR THEODORE J CURPHEY, *Nassau* Your Reference Committee in conference with the Publication Committee of the JOURNAL, in the short time at our disposal, was impressed with the complexities of the problem of publishing a scientific periodical in these times of rising costs and economic uncertainty In view of these facts your Reference Committee would move a vote of thanks to the Publication Committee, and would further assure them of our confidence in their efforts on behalf of the Society In passing, too, your Committee would like to comment them for their independence and clarity of thought that now characterizes the editorial policy of the JOURNAL At this point your Committee would further recommend the continuation of this body in the ensuing year, as established by previous motions of this House

I move the adoption of this part of the report

DR PETER J DI NATALE, *Genesee* I second it

There being no discussion, the motion was put to a vote, and was unanimously carried

Section 134 (*See 16, 17, 132, 133*)

Report of Reference Committee on Report of Council, Part XI Scientific Medical Advertising

DR. THEODORE J CURPHEY, *Nassau* The question of scientific medical advertising in the JOURNAL was next considered by your Committee The supplementary report recently issued by the Publication Committee was carefully studied, along with Dr Bauer's comments from the floor of the House thereon The Committee was further favored by the appearance of both Dr Bauer and of members of the Publication Committee, at which time a very frank and friendly discussion of this matter ensued

As a result of this, and from a consideration of these reports, certain facts are obvious

1 In the mechanism of publication certain errors are bound to appear at rare intervals

2 The rules and regulations of the Council on Pharmacy and Chemistry of the American Medical Association may at times be considered as arbitrary, and thereby might tend to exclude desirable advertising of products of proved clinical merit

3 The Reference Committee approves the principle of the Publication Committee in preserving an independence of approach in keeping with true democratic policy

As a part of the deliberations of your Committee on this matter it took the opportunity of canvassing the opinion of the professor of pharmacology of one of the New York medical schools, seeking information as to the approach of the Council on Pharmacy and Chemistry in the past and advice as to a policy for the guidance of the Publication Committee in this very troubled question of scientific medical advertising

Based on the foregoing your Committee would like to recommend that, for the purpose of making the tasks of the Publication Committee less onerous, an advisory committee be formed, comprising members of the clinical group coupled with pharmacologists trained in the clinical and research approach, with the avowed purpose of assisting in the evaluation of products prior to their acceptance for advertising in the JOURNAL

We further respectfully suggest that the following policy be established

1 That Council-approved preparations be accepted without question for advertising in the JOURNAL

2 That all other products submitted be passed upon by the recommended advisory committee

3 That the final responsibility of acceptance or rejection should rest entirely with the Publication Committee

4 That advertising other than that falling in the scientific field be not included in the purview of this report, but be left to the discretion of the Publication Committee

Finally, in connection with this entire matter of scientific medical advertising, your Reference Committee would like to go on record as disapproving the editorial of the A M A of February 7, 1948, as being unwarranted, unjustified, and in decidedly poor taste

The Reference Committee further moves acceptance of the Public Relations report, and would recommend a vote of thanks to that Committee for their excellent work in our behalf

I move the adoption of this part of the report

DR JAMES F ROONEY, *Trustee* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

Section 135 (*See 89*)

Report of Reference Committee on Report of Council, Part XI Premature Publicity of Medical Matters by State Officers

DR THEODORE J CURPHEY, *Nassau* On the resolution introduced by Dr Alfred Angrist of Queens, "Premature Publicity of Medical Matters by State Officers"

> "WHEREAS, it has been the policy for governmental agencies in the past to promote press releases on the expansion of services and the introduction of new programs which involve the physicians of the community when the cooperation of the local physicians is both desirable and necessary,
>
> "WHEREAS, subsequent discussions of modification of the projected program to render it effective and efficient improperly places the physicians in the light of obstructing such expansion of services to the public, therefore be it
>
> "*Resolved*, that the Medical Society of the State of New York go on record as advising the interested governmental agencies that the Medical Society of the State of New York is always ready to conduct preliminary discussions about such projects which involve medical service and the allied branches of activity of the government, before press releases are promoted on such matters"

Your Reference Committee approves the principle of this resolution

I move the adoption of this part of the report

DR EDWIN A GRIFFIN, *Kings* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 136 (*See 90*)

Report of Reference Committee on Report of Council, Part XI State Expansion of Laboratory and Diagnostic Services

DR THEODORE J CURPHEY, *Nassau* On the

second resolution introduced by Dr Alfred Angrist of Queens entitled 'State Expansion of Laboratory and Diagnostic Services

WHEREAS the question of expansion of diagnostic facilities including laboratory work BCG and x-ray studies is contemplated throughout the city and State of New York and

WHEREAS it is the considered opinion that existing facilities are in need of more adequate staff and funds therefore be it

'*Resolved* that the Council state its willingness to appoint representatives familiar with these services who, together with the Health Department of the City and State of New York study the entire problem with a view of adequately staffing existing facilities before considering the expansion of such facilities.

Your Reference Committee approves this resolution and further suggests that members of the Section on Pathology and Clinical Pathology of the Medical Society of the State of New York and members of the New York State Society of Pathologists be selected to sit in with any committee concerned in a discussion of this matter

I move the adoption of this portion of the report

DR. EDWIN A GRIFFIN *Kings* I second the motion.

DR. ALFRED ANGRIST *Queens* For the record may I just say at this juncture that I think it was the purpose that this not be interpreted as representing opposition on our part to such extension of services by State authorities or city authorities, including diagnostic services of all sorts but that we be understood by this resolution to imply that we are in favor of such extension however that (1) the existing services be rendered at peak efficiency and (2) that in extending such services we make haste slowly At least the fear exists among some of our colleagues that the rapid extension of such services has potential dangers in it and abuses are easily manifest as evolving in the rapid appearance of such a program some of them approaching the equivalent of State medicine.

We therefore feel that study of such policies is in order and that their extension should be a gradual one and not imply the immediate application of a program over a large area.

DR. SAMUEL Z FREEMAN *New York* I would like to ask a question of Dr Angrist Does that also refer to the extension of these services in the City of New York?

DR. ANGRIST Yes, the resolution was presented in the broad form to include all such services by State and city officials.

DR. FREEDMAN Then I would like to discuss and lead up to an amendment because within the last three weeks or so there has appeared in the newspapers of this city that the Departments of Hospital and Health have taken it upon themselves to extend these services of a similar nature without making it clear to me at least, whether or not these services are to be available to all the people of the City of New York or whether they will be limited to the medically indigent I think at this point it is very important, therefore, to clarify the issue whether or not we tacitly approve that these services be extended without being recorded that we favor these services to be extended only to the medically indigent. Therefore I would amend the resolution to read that we approve of the extension of these services to the medically indigent

DR. STEPHEN H CURTIS, *Section Delegate* I second the amendment.

SPEAKER ANDRESEN Is there any discussion of the amendment?

DR. THOMAS M D ANGELO *Queens* So far as the Department of Hospitals in the City of New York is concerned, those services would be open only to indigents. As far as the Department of Health is concerned anyone can step into a Department of Health agency whether he is a pauper or a millionaire, and ask for that service

SPEAKER ANDRESEN Is there any further discussion of the amendment?

DR. JAMES F ROONEY *Trustee* I think that we should announce a policy that covers not alone a section of the State or a part thereof but the whole State What we recommend should apply to New York City and upstate just as well. I am very glad to hear this discussion this morning pointing out the fact, as Dr D Angelo has just said that any person can step into, let us say, any of these survey groups for radiographs and the like irrespective of means or anything of the sort There has been a great deal of advertising in the common press of group examinations extended to the whole population in a certain area upstate within the last three weeks. It seems to me that that is just the way State medicine begins. We have had this gradual encroachment over a period of thirty five years It had been gradual, and it is accelerating therefore I feel that the recommendation made by the committee is an excellent one I don't intend to propose an amendment but I do hope it will be made coextensive for the whole State and not simply be limited in reference to one portion of the State.

SPEAKER ANDRESEN It does apply to the whole State doesn't it, Dr Curphey?

DR. CURPHEY That is my understanding of it, but the problem is more peculiarly that of New York City I take it.

CHORUS No

SPEAKER ANDRESEN Is there any further discussion of the amendment?

DR. WILLIAM B RAWLS *New York* In all fairness to what has been said about the Department of Health I would like just to state a few things for your information We have had a meeting with the Commissioner of the Department of Health, and it is not true that he proposes to take in everyone. He has no policy set, and before any policy is set he has promised that he will take it up with the five county medical societies in New York. I happen to have had a meeting with him at which Dr D Angelo was present, and we know he does not propose to go ahead yet, and he has no policy set. Neither does the Commissioner of Hospitals. The Commissioner of Hospitals has said he would limit it only to the medically indigent the Commissioner of Health said he would like to do the same thing As to what he is going to do that is what we had the meeting about one week ago That is only for your information

DR. ANGRIST On the amendment I do not feel the amendment is necessary because of the recommendation of the Reference Committee to refer the resolutions for study That would cover any singular proposition that is included in the amendment. Of course in the study the question of the indigent and the means test would be easily encompassed I think the purpose of the resolution is precisely what Dr Rawls has mentioned in this discussion. At the meeting that I had the privilege of attending, the Commissioner of Health said specifically that he did not favor a means test for these cases

DR ROONEY That's the point

DR. ANGRIST Therein lies the rub It may be very proper that the means test is below the dignity of the citizens of our State However, some precaution is necessary The only precaution suggested thus far has been that no such patients would be given treatment, which includes treatment or diagnosis, unless recommended by a physician Gentlemen, in my own experience that has always proved inadequate, because our own physicians are too loath to forget the welfare of their confreres in the specialized services I feel that we should just leave the resolution as it is It has no action It merely calls for an opportunity of study All we are doing, in effect, is to enter upon the books the fact that we are willing to cooperate in this matter, but that the cooperation should consist in observing a pilot group, a test group, to see how it works out, how far the abuses will go, how far politics will enter into it Those are the features to determine before we give our endorsement This does not imply an endorsement It implies a willingness to cooperate and to see how this thing will work out I would be in favor of opposing the amendment and favoring the original resolution

DR. SAMUEL B BURK, *New York* May I take this opportunity to discuss the amendment? While we are about to study this situation I believe that there is no harm, just as Dr Rooney has indicated that it is important that we guide the committee or guide those who are going to undertake this study by a policy of this body indicating that we are in favor of looking after our indigent Whether or not anything will come out of that, just as Dr Angrist stated, from the standpoint of study, that is another matter, but I believe that we should go on record indicating our own policy

SPEAKER ANDRESEN Is there any further discussion of the amendment?

DR ANGRIST May I—

SPEAKER ANDRESEN Please do not discuss again, Dr Angrist I think we will have to stick to the rule that only one discussion by a person is allowed on any matter, otherwise we will never get anywhere

Is there any other discussion by anybody else in regard to including that clause pertaining to the indigent?

The question was put to a vote, and the amendment was carried

SPEAKER ANDRESEN Is there any discussion on the report of the Reference Committee as amended?

The question was called, and the motion was put to a vote and was carried

DR CURPHEY I move you the adoption of the entire report, as amended

DR. SAMUEL B BURK, *New York* I second the motion

There being no discussion, the motion was put vote and was unanimously carried

SPEAKER ANDRESEN Thank you, Dr Curphey! I think in the interests of fairness I should refer to the Reference Committee reports in the order in which we have them If there is any person interested in having a particular one brought up earlier, I would like to hear it, otherwise I think in the interests of fairness we will take them in the order in which they are listed

DR JAMES F ROONEY, *Trustee* There is one very important report, and that is the one concerning the War Memorial I am afraid it is going to require considerable discussion, though perhaps not, because it involves what this Society desires to do by way of the expenditure of a considerable amount of money There is a serious question as to how that money shall be raised, and I feel that that report being so important should at least not be relegated to the last hours of the session when men are tired and many things may be done that they may be very sorry for within a year

SPEAKER ANDRESSEN If there is no objection, we will take up Dr Henry's report first

There was no dissent expressed

Section 137

Report of Reference Committee on Report of Council, Part VIII War Memorial

DR J P HENRY, *Monroe* Your Reference Committee has carefully considered the report of the special committee on a War Memorial This report suggests the establishment of an educational fund for the children of members of the State Society who died while in the armed services during World War II and outlines several plans for such a fund if established The report contains exhaustive statistical data on the subject, and the members of the Committee are to be complimented on the thoroughness of their work

Your Reference Committee approves the idea and the recommendation of the establishment of such a memorial fund, by means of a special assessment to be levied on the membership of the Society We approve the recommendation that the monies accruing from this assessment be placed in a special investment fund by the Board of Trustees, to be kept separate from all other funds of the Society and to be disbursed solely on order of the Council or a special committee thereof, within the provisions of the plan suggested

We recommend the adoption of the suggested Plan III, reworded as follows

"Plan III

"To each beneficiary covered by this Memorial Fund there shall be made a contribution of $600 per annum, beginning on completion of secondary (high school) education and continuing while the beneficiary pursues a collegiate and/or a professional postgraduate course, up to the age of 25 years, if he or she remains unmarried The amount of this annual contribution shall be changed only by vote of the House of Delegates The Council shall be authorized to care for cases of special educational need arising in the secondary (high school) level within the limitations of the available funds"

The cost of this plan, as estimated by the Committee on War Memorial, would be approximately $224,000

We approve the recommendation of a special assessment of not to exceed $12 per member to cover this cost

We recommend that, on completion of the purpose of this Memorial Fund, the unexpended balance, if any, be disposed of, in accordance with the vote of the House of Delegates at that time

I move the adoption of this portion of our report

DR MARGARET JANEWAY, *New York* I second it

SPEAKER ANDRESEN The adoption of this report is open for discussion

DR. LOUIS H BAUER, *President* I would like to ask for a point of information, Mr Speaker How is this assessment to be levied? Is it to be one assessment? I assume that is the case because I don't think the House can commit further houses

DR. JAMES F ROONEY, *Trustee* May I answer, Mr Speaker?

SPEAKER ANDRESEN You may

DR. ROONEY Yes, the committee recommended that the monies be raised by a special assessment The estimated special assessment for Plan III would be $12 for each member of the Society Much discussion was had concerning whether or not this assessment could not be made payable over a period of some years Under the Constitution and Bylaws no House of Delegates can commit the Society to a special assessment except for the duration of the life of that House

Then gentlemen in addition to that the figures arrived at in this were that an investment trust be created because we are not going to reach the summit of the demand for the expenditure of money until about 1954 to 1958 and that summit of demand will then continue for a period of approximately nine years. We will not amortize the whole affair provided that all of these children live until approximately 1968 That is the reason why your Committee recommended that the money be raised by one assessment invested by the Board of Trustees, with the proceeds of the return on that investment accruing to the fund That essentially is the point, but the assessment if it be levied must be levied at once and in one year

SPEAKER ANDRESEN Is there any further discussion?

DR. BENJAMIN M BERNSTEIN *Kings* I am a member of the Reference Committee which discussed this thing yesterday or the day before at quite some length, and I should like to say that Dr Rooney and his Committee did a remarkably fine job at gathering material and data, which we per used for several hours before we came to our conclusions

There are 58 children involved I think you should know some of these facts. These 58 children come from all over the State. A breakdown by this committee was very detailed as far as number of school years and the like. There were three plans proposed—I hope Dr Henry forgives me for entering upon the discussion instead of his doing it.

SPEAKER ANDRESEN May I interrupt and say that those plans have all been published We have all had an opportunity to read them If you have any particular comment to make concerning any of them, please do so

DR. BERNSTEIN No I have none at all except to say that I don t think we need to discuss the necessity for the War Memorial You have acted upon that in the past. The assessment has been placed at a level of $12 in order to supply the needed funds Although there may be some available when we are finished with spending the fund as the resolution stated that remainder may be used at your discretion

DR. FREDERICK W WILLIAMS *Bronx* I would like to raise the question for the consideration of the Reference Committee as to just the technic of collecting this special assessment. Who will send out the due notice of the special assessment? I think that should come directly from the State Office to the member to let him know that this a special assessment to the War Memorial of the State Society and not be collected through the counties

DR. ROONEY Will the chairman of the Reference Committee yield for a moment?

DR. HENRY Surely

DR. ROONEY If you approve this resolution, gentlemen, that we institute such a fund, after that is approved then a separate question must be raised and that is how the necessary assessment to carry out the purposes of the House shall be put into effect. According to the Constitution and Bylaws that assessment must be made upon each member and notice must issue with the notice for the dues payment for that year that a special assessment is assessed against each member by the State Society for that specific purpose and that specific purpose alone So that notice will have to go out in that way Dr Williams if you vote favorably upon the adoption of this Plan III

DR. JAMES R. REULING *Treasurer* I would just for the sake of the record like to pose the question if a man does not pay his dues he is dropped for nonpayment what if a member does not pay the special assessment?

DR. ROONEY He is also dropped

DR. REULING I take it that the action of the House would mean that he was dropped for non payment of dues?

CHORUS Correct

DR. REULING I think that should be clearly understood in the discussion of this motion

DR. ROONEY May I again encroach upon the time of the House but briefly to get this thing settled? The Constitution and Bylaws are specific. They stated that every member to retain his membership in the State Society and in any county society must have paid all of his dues and assessments or he will be dropped for nonpayment of dues or assessments That is all

SPEAKER ANDRESEN Thank you!

DR. BENJAMIN F GLASSER, *Queens* Mr Speaker and members of the House of Delegates I would be the last one or should be the last one to be accused of not wanting to put up a War Memorial of some sort for the veterans I say that because I have been in the armed forces in both world wars so I have a right to say it. I am not opposed to the resolution nor to the question of putting up a memorial but I think sometimes we go the whole way and more than the whole way when a problem arises and in this case I think we have gone too far

Offhand as I understand it we will take a child who has entered the second or third year of high school and begin to support him until the age of twenty-five That means a total period of about ten or eleven years I know we mean well but I don t think that is showing good sense. If the party needs support we should be here and ready and able and willing to give it, but to take these children and push them through college and medical school and all other sorts of things from the time when they don t even know what it is all about I think is not the best policy

For that reason I think the whole subject should be studied, including the assessment, so that we as members know more about it than the report given to us this morning

DR. ROONEY May I ask again that Dr Henry yield because I think I can answer my friend? I believe he has misconstrued to a large degree the whole situation.

SPEAKER ANDRESEN Will you yield?

DR. HENRY Yes.

DR. ROONEY This question has been lying fallow in the House for nearly three years In fact, since 1945 when it was first proposed. There is no question of supporting these children as a matter of fact the proposal is not even going to pay the cost of their medical education, nor is it going to pay the full cost of their collegiate education If my friend had read the report of the Committee, the supplementary report as distributed he would find that we

only allow $600 a year Well, the Committee felt that they would make that contribution rather than providing they would pay the full cost of the children's collegiate or medical education, in order that these children should have an incentive to do something for themselves It is not going to support them

You will also notice that in every one of these plans it was stated if they remain unmarried We felt there might be some opportunity of, well, persons of both sexes who would sort of have a feeling that here they had this thing guaranteed to them and they could marry and carry on for a year or two and then drop out This support will terminate the moment they leave college or the moment that they leave school, if they go to medical school

It seems to me, gentlemen—and I can say the same thing that the preceding speaker said, except I happen to have been a veteran of three wars instead of two—and I have a very keen feeling that sometimes being a veteran is used as a means of getting a handout If you had read some of the letters that I have had in response to the Committee's questionnaire—pathetic—a widow with four children working to support that family and trying to keep the children in school Another from a mother whose daughter is in her first year in college, and she wonders if she could have some assurance because if she cannot have some assurance of some additional support, the girl is going to have to leave college this year I stated in my report that if the House wishes to hear any of these facts, I have them all verified, and I will be glad to read them, but I don't want to take up the time of the House unless they want to have this done Gentlemen, it is a worthy object

DR HOMER J KNICKERBOCKER, *Ontario* I would like to ask if it is cumulative, and is it mandatory to be paid to the individual or may he leave it and let it accumulate for later use?

DR ROONEY May I again reply? I am sorry, gentlemen, but if this report of the committee had been read these questions would not arise It is specified in the report, the original report of the committee, every question that has been asked here is provided for in that report which you all received four or five days ago, including the supplementary report giving the plans When you speak about allowing it to accumulate, no The collection of the money if you so provide will be mandatory because it will be a State assessment The report states that we recommend, and Dr Henry has stated that in the recommendation of the Reference Committee, it be placed in an investment fund, the proceeds of which will accumulate in the fund, but that that money cannot be expended except by the direction of the Council or a committee thereof as the need arises upon each child attaining the age of seventeen or upon finishing high school, as provided in Plan III That is all provided for Is there anything further, Dr Knickerbocker?

DR. KNICKERBOCKER Specifically, if the individual, the student, will not need that this year, is it mandatory for him to draw it, or if he wishes can he lay it aside for another year, or is that administered by the committee that is in charge of the fund?

DR ROONEY May I answer?

DR HENRY Yes

DR ROONEY The point of fact is that we felt that it was not alone derogatory to the memory of these men who died in the service to require a means test, but that this was to be provided for all of these children, not upon request, but when they attain the age of seventeen or had finished high school—and the original report says whichever is later—that they shall then be eligible It must be by application This list will remain in our files We have the questionnaire with all of the ages and everything of the sort that will go into the custody of the Secretary of the Society No money can be dispensed unless the Council requests the Board of Trustees to authorize the expenditure, let us say of $1,800, to provide for the beginning collegiate education of three of these children at $600 a year each, so I hope that answered your question

DR. KNICKERBOCKER It has

The question was called, and the motion was put to a vote and was carried

Section 138 (See 26)

Report of Reference Committee on Report of Council, Part VIII Hospital and Medical Care for Veterans

DR JOSEPH P HENRY, *Monroe* Your Reference Committee considered the resolutions referred to it and reports as follows

Concerning the resolution introduced by Dr Aranow for the Council regarding Veterans Administration with requests for action by the American Medical Association

"WHEREAS, the Medical Society of the State of New York believes that veterans who have been injured or disabled in the service of their country are entitled to the highest type of medical and hospital care, and

"WHEREAS, Point Seven of the Ten Point National Health Program of the American Medical Association on 'Veterans' Need for Hospital and Medical Care' reads

'A program for national health should include the administration of medical care, including hospitalization, to *all* veterans, such medical care to be provided preferably by a physician of the veteran's choice, with payment by the Veterans Administration through a plan mutually agreed upon between the state medical association and the Veterans Administration',

and

"WHEREAS, no differentiation is made in the above-mentioned program between veterans suffering from illness or disabilities incurred in or aggravated by military services and those veterans suffering from illness or disabilities not incurred in or aggravated by military service, and

"WHEREAS, the present policy of the Veterans Administration is to furnish medical care and hospitalization to veterans whose illness and disabilities were not incurred in or aggravated by military services only when such veterans are not able to 'pay the necessary expense of hospital care' and when ' a bed is available in an existing facility', and

"WHEREAS, the Veterans Administration has neither the legal right nor the administrative machinery to investigate affidavits on financial ability of such nonservice-connected cases ' to pay the necessary expense of hospital care', and

"WHEREAS, nearly two thirds of the beds in Veterans Administration Hospitals are now filled with patients with nonservice-connected disabilities, and

"WHEREAS, the Veterans Administration now has 126 hospitals at a cost of over one billion dollars, and

"WHEREAS, the Veterans Administration currently has over 5,000 beds closed because of in-

ability to obtain personnel without lowering the standards of medical care and

'WHEREAS, the unlimited expansion of Veterans Administration hospitals will lead to an inferior grade of medical and hospital care for veterans, and at the same time injure the quality of hospital service that is available for the entire population by draining professional and technical personnel away from hospitals which serve the public as a whole be it

Resolved that the Medical Society of the State of New York, in view of the foregoing, instruct members of the House of Delegates of the American Medical Association to request at the next regular session of the House of Delegates of the American Medical Association that action be taken to amend Point Seven of the Ten Point National Health Program of the American Medical Association on Veterans Need for Hospital and Medical Care to read

'A program for national health should include the administration of medical care including hospitalization, to all veterans *currently entitled to such medical care and hospitalization under existing Federal statutes* such medical care to be provided preferably by a physician of the veteran's choice with payment by the Veterans Administration through a plan mutually agreed upon between the state medical association and the Veterans Administration

and

'*Resolved*, that the House of Delegates of the American Medical Association be requested to go on record as favoring Congressional action to interpret the following requirements of admission of nonservice-connected cases to Veterans Administration Hospitals

'1. The ability to pay the necessary expense of hospital care and

'2. ' if a bed is available in an existing facility and

'*Resolved*, that the House of Delegates of the American Medical Association at their next meeting be requested to go on record as favoring a definite ceiling on the number of beds to be provided in Veterans Administration hospitals and that such a ceiling be placed at 140 000 beds the number already authorized by Congress.

We approved this resolution and recommend its adoption and I so move

DR. BENJAMIN M BERNSTEIN *Kings* I second the motion.

SPEAKER ANDRESEN It has been regularly moved and seconded that this portion of the report approving the resolution be adopted Is there any discussion?

DR. FREDERICK S WETHERELL, *Onondaga* The word 'facility may be misconstrued Does that mean a veterans facility as they used to call them or does that mean an existing hospital in the locality? The word facility ' may be misinterpreted

SPEAKER ANDRESEN I think that usually applies to a Veterans Administration hospital or clinic doesn t it?

DR. JAMES F ROONEY Is Dr Bauckus here?

There was no response.

DR. ROONEY He is the chairman of the Committee, but I am the *vice-president of our* Plan. The word 'Veterans Administration facility is a general term they use for everything in connection with the Veterans Administration especially as regards local agencies.

DR. LOUIS H BAUER, *President.* I am in thorough sympathy with this. I feel, however that we should be very careful as to the wording of it because if there is an opportunity somebody will hop on the medical profession saying they don t want to take care of the veterans or we will antagonize the American Legion, etc. If we adopt this resolution, I would move that we amend it by adding that the final wording of this resolution be gone over very carefully in the Council so we may be sure that its final wording will be one that cannot be misinterpreted as to our intent.

DR. ROONEY Are you going to move that this go to the Council that this be referred to the Council with such amendment?

DR. BAUER I am moving that the final wording of it be left to the Council.

DR. ROONEY That it be referred to the Council for relieving any ambiguity in language?

DR BAUER Yes.

SPEAKER ANDRESEN Will you restate your motion?

DR. BAUER The motion is we accept in principle but the final wording be left to the Council to determine.

SPEAKER ANDRESEN That is an amendment to the original motion of the Reference Committee

DR. BAUER That is right

DR. ROONEY I will second it

There being no further discussion the amendment was put to a vote and was unanimously carried

SPEAKER ANDRESEN Now we have the original motion as amended Is there any discussion?

The question was called, and the motion was put to a vote and was unanimously carried

Section 139 (See 68)

Report of the Reference Committee on Report of Council, Part VIII Veterans Administration

DR JOSEPH P HENRY *Monroe* We now have a *group of resolutions introduced by Dr Bauckus for* the Liaison Committee with the Veterans Administration

Resolved that the Medical Society of the State of New York reaffirm its endorsement of a program that will give the veteran the best medical and hospital care attainable

Your Reference Committee approves of this, and I move its adoption.

DR. BENJAMIN M BERNSTEIN *Kings.* I second the motion

There being no discussion the motion was put to a vote and was unanimously carried.

DR. HENRY The second reads

Resolved that any new contract entered into by the Veterans Medical Service Plan, Inc. shall provide for the free choice of physician for the veteran Exceptions to this rule to be made only by mutual agreement by an appropriate committee of the two parties

We approve this, and I move its adoption.

DR. EDWIN A GRIFFIN *Kings* I second the motion

DR. ROONEY 'I would like to amend that language too because that is rather ambiguous. I would like to amend it in this way and I move this as an amendment for the last sentence that any exceptions to this provision —is that your language Dr Henry?

DR. HENRY "Exceptions to this rule to be made only by mutual agreement by an appropriate committee of the two parties.

DR. ROONEY Exception to this rule shall be made only by conference and appropriate agreement between the Veterans Medical Plan of New York, Inc , and the Veterans Administration

SPEAKER ANDRESEN Will you accept that amendment?

DR. HENRY Yes, I believe the Reference Committee would have no objection at all to accepting such an amendment, and I will accept it

The question was called, and the motion was put to a vote and unanimously carried

DR HENRY Number 3 reads

"That the fee schedule be a State-wide schedule approved by both parties and subject to change in specific instance by mutual agreement"

We approve that recommendation, and I move the adoption of that portion of the report

DR. ROONEY Mutual agreement of the same parties noted in the preceding paragraph?

SPEAKER ANDRESEN Would you accept that, Dr Henry?

DR. HENRY Yes, we approve that and recommend its adoption

DR. THOMAS A McGOLDRICK, *Past-President* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

DR HENRY Number 4 reads

"That the State Medical Society disapproves of part-time employment of its members in any capacity which shall forbid the private physician from practicing medicine outside of assigned hours, including the care of veterans on a fee basis"

Your Reference Committee approves of that, and I move its adoption

DR. THOMAS A. McGOLDRICK, *Past-President* I second that

There being no discussion, the motion was put to a vote and was unanimously carried

DR. HENRY Number 5 reads

"That there are or have been regulations which deny, to former part-time or full-time physicians resigning from the Veterans Administration, the privilege of caring for veterans on a fee basis system for a period of two years following the physician's resignation, excepting only the physicians removing to a distant locality We condemn such interference as un-American in its abrogation of individual rights, a negation of the free choice principle, and a dictatorial bureaucratic device which limits and obstructs medical service to veterans, at the same time serving as a penalty to physicians, in many cases veterans themselves"

We approve of that, and I move its adoption

DR. HARRY ARANOW I second that

DR. ROONEY Once, again, Mr Speaker, that rule was put into effect very largely because abuses were happening Many young medical officers in a number of localities in the State took on temporary positions with the Veterans Administration, and due to the fact that they were assigned as authorizing agents for the Veterans Administration they acquired a very large group of men, veterans, applying for domiciliary care who got to know them very well, and after they had four or five months in these jobs they would arrange it so and suggest to these men—and this has come under my own observation—they were leaving the Veterans Administration but they could take care of them, because they were going to go into the private practice of medicine

We had one instance in the middle of the State where one man who went into the Veterans Administration as an employe, and I think he remained in the employment of the Veterans Administration for approximately five months and then left it, and within the first six months after he had left the Veterans Administration he had been paid something in the neighborhood of $16,000 for caring for veterans who were authorized to him That was when the rule went into effect that no man in part-time employment of the Veterans Administration and no man who was doing domiciliary care for veterans would be allowed to be paid any more than $6,000 a year In my opinion it is a just ruling Those were some of the things that got us in bad with the Veterans Administration, because at the time we had no means of stopping this sort of thing The $6,000 limit was the primary thing that did it, and, just as soon as the cream was out of the coconut, in this one particular instance, the gentleman has departed to take postgraduate courses as he stated openly on the basis of the around $20,000 he got out of the Veterans Administration on this sort of thing within the period of less than a year and a half

I feel that the language of some of this should not go into effect because you notice it means a two-year lapse I think that is too long It should be something like six months rather than two years We can object to the two-year rule I do not feel, however, that we should use the word "arbitrary" We are going to have to renegotiate a contract with the Veterans Administration or abandon our Plan, and that contract renegotiation is going to have to be made before August of this year I see no reason why we should unnecessarily antagonize the Veterans Administration, although I do feel that since General Bradley and General Hawley have left the Veterans Administration and the new regime has taken over there is a studied effort on the part of the Veterans Administration to revert to the rotten sort of stuff that we had from 1920 on until Bradley and Hawley came in I feel that that is the story, and that that language should be changed However, Dr Bauckus is now in the House, as I see, and I think perhaps he may want to say something about it But I feel we should change this and not use the word "arbitrary" because I don't believe they are arbitrary in this, though they are arbitrary in other things that they are doing that are not embodied in this However, I would like to hear what Dr Bauckus has to say about the matter

DR HERBERT H BAUCKUS, *Past-President* In the first place anyone who is licensed to practice medicine in the State of New York has that right I don't want to be a party to anything that interferes with the rights of a practitioner of medicine That is the fundamental point in this resolution

Secondly, if we made any changes in this resolution we would do something to remove free choice of physician, which you have approved in Resolution Number 2

If it so happens that a veteran has been a patient of the physician while he was employed by the Veterans Administration and he makes the choice to have him continue to take care of him, I want him to be able to do that I don't see how we can do anything else unless we change our principle of free choice

The third thing about this is that when they in various areas of the State put this into effect, by the way, without our knowing about it until we found out instances, they made exceptions, and pretty soon the exceptions were very general, so the regulation did not mean so very much after all

The next thing about this question of how much the doctor may earn in a year this $6 000 limitation if there is anything wrong about any physician s method in receiving money it should be brought to the attention of the Coordinator in that area, when it will be brought to the Board of Directors attention I told you that everything has been done to insure a smooth working relationship As I said yesterday, every time there has been a complaint an investigation was made. I did not tell you yesterday that of late months there has been a great effort to put much of this former fee basis practice on a contract basis That is true I am sorry to say and I could read you a list of 20 institutions and groups in New York State who are now accepting cases from the Veterans Administration on a contract basis Many of them are neuropsychiatric, but there are other kinds of cases involved too so that is a way as I see it of getting around our free choice principle While they have designation and they also have the $6 000 limit, still a man in the contract business can get *all that is sent to him* and *there is no limitation* in the amount of money he shall get

When they talk about the excessive costs of the fee basis system, I want to point out that in these contract cases relating particularly to neuropsychiatry the doctor under our Plan is paid $10 an hour In most of these contracts it costs $11.50 to $12 an hour The only difference I can see is that it is taking it away from the free choice principle and the fee basis system and putting it under a contract system which is certainly against our principles. That is one of the most discouraging things that I have found Therefore I say let us not have any interference at all with our free choice principle, and let us not have any interference with the private practice of medicine as we are wont to carry it on in New York State.

Dr. Louis H Bauer, *President* I would like to move an amendment to this Number 5 The first sentence I think is all right There are or have been regulations which deny to former part time or full time physicians, resigning from the Veterans Administration the privilege of caring for veterans on a fee basis for a period of two years following the physician s resignation excepting only the physician s removing to a distant locality and stop there and delete the rest of it and substitute the following "That the House of Delegates requests the Veterans Medical Service Plan Inc. to enter into negotiations with the Veterans Administration to obtain modification of this rule in such manner as to protect the rights of the Veterans Administration and at the same time to prevent discrimination against ethical physicians.

Dr. Rooney I second that

There being no discussion the amendment was put to a vote and was unanimously carried

Speaker Andresen The resolution as now amended is before you for discussion

The question was called and the motion was put to a vote and was unanimously carried

Dr. Henry Number 6

That we support the American Hospital Association in its stand against the building of veterans' hospitals beyond the present-day requirement that we favor free choice of hospital by the veteran in the service-connected case whether the selection be a veteran community or a private hospital that the expansion under the Hill Burton plans would provide additional hospital facilities enabling the veterans to choose and have care in their own localities that as far as can be ascertained at present, if the proposed plan for construction of 92 additional veterans hospitals is carried through the bed capacity of those hospitals together with those already existing under the Veterans Administration will be over twice the calculated bed needs for the next fifteen years.

We approve that recommendation and I move its adoption.

Dr. James F Rooney, *Trustee* I second it.

Dr. Joseph A Geis *Essex.* Will free choice to the veteran of the hospital he wants not interfere with the free choice of physician in fact most of the hospitals and advisedly so have closed staffs? Suppose we now grant free choice of the hospital and free choice of physician and the physician he picks cannot work in that particular hospital that he picks? I believe that that should be worded a little better so that the free choice of physician is not sacrificed to free choice of hospital

Speaker Andresen Can you make an amendment to that, Dr Geis to take care of your objection?

Dr. Geis I would suggest that be referred to the Council for clarification. I could not make the necessary amendment off the floor

Speaker Andresen Add to it the clause that it is to be referred to the Council for clarification?

Dr. Geis And giving free choice of hospitals only as far as it is consistent with free choice of physician

Dr Homer J Knickerbocker, *Ontario* I second that amendment.

Dr. Bauckus On the question of the amendment if it is referred to the Council that may take some time for action, and we are soon to meet with the American Hospital Association and with Dr Magnuson on this question In our second resolution we emphasize free choice of physician As I understand it it is the physician who first advocates hospitalization and under our methods of practice he must find a place in the hospital where he can take care of his patient I brought this out yesterday—that at the present time when the doctor wants a patient to go to the hospital the patient does not receive authorization for hospitalization They have stopped that except in an emergency We want the surgeon for example, to have his patient, and take care of him in a hospital, and I think that certainly is indicated in that resolution We don t have free choice of hospital unless we have free choice of physician.

Dr. Geis I will modify that instead of it going to the Council, we refer it to Dr Bauckus organization—I am not sure of its exact name—for such change before they submit it to the Veterans Bureau

Chorus No

Speaker Andresen Is there a second to that?

There was no response

Dr Ezra A. Wolff *Queens* I was going to suggest free choice of type of hospital which I think would not limit them to a single hospital but might allow them to choose a voluntary hospital or proprietary hospital with which their chosen physicians are connected.

Speaker Andresen Do you think that is necessary?

Chorus No

Speaker Andresen The amendment is to refer this to the Council.

Dr. Rooney It seems to me in discussing the amendment that we are going to try to do right here

and now by voice from the floor the amending of something that is very important I cannot quite agree with my good friend, Dr Bauckus, that it is going to take the Council a long time to do it because the Council is going to have to meet after this session, and if it is a clarification of language this thing can be clarified and made conformable to the express wishes of the House in the matter of five minutes I am still in favor of the reference to the Council for clarification of the language and preservation of the intent of the resolution, and referring it to the Council for immediate consideration this afternoon

SPEAKER ANDRESEN The second amendment was not seconded, and the amendment we are considering is the reference to the Council, which has been further amended that it be referred to the Council for clarification of the intent of the resolution and decision this afternoon

DR HENRY We accept that as part of the original motion

The question was called, and the motion was put to a vote and was unanimously carried

DR HENRY Number 7

"That we recommend the formation of a special committee composed of representatives of the veteran organizations, Veterans Administration, and a special committee of the Medical Society of the State of New York for discussion and consideration of veteran hospital and medical care"

We approve that recommendation, and I move its adoption

DR. B M BERNSTEIN, *Kings* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

DR HENRY Now I move the adoption of the whole report as amended

DR ROONEY I second it

There being no discussion, the motion was put to a vote and was unanimously carried

Section 140 (*See 14, 137, 174*)

Asking for Reconsideration of War Memorial

DR LEO F SCHIFF, *Clinton* As one who voted for the motion in question, I will now move for the reconsideration of the vote on the War Memorial, and if I may speak for a minute on the reason

SPEAKER ANDRESEN Yes

DR SCHIFF This is a very small group The vote was to my estimation very indecisive We have a great responsibility My purpose in moving for this reconsideration will be to bring before you the question as to the desirability of having a referendum of the Society on the matter, and it is for that reason I make the motion to reconsider

SPEAKER ANDRESEN A motion to reconsider has been made Is there any second?

DR EZRA A WOLFF, *Queens* I will second it

There being no discussion, the motion was put to a vote and was defeated

Section 141

Report of Tellers

SPEAKER ANDRESEN I declare the following elected as Delegates W P Anderton, M D, Albert F R Andresen, M D, James R Reuling, M D, Floyd S Winslow, M D, Herbert H Bauckus, M D, O W H Mitchell, M D, Thomas M Brennan, M D, Ralph T B Todd, M D, Albert A, Gartner, M D, and William B Rawls, M D

And the following elected as alternates in the order of the votes they received Edward D Flood, M D, Leo F Schiff, M D, W Guernsey Frey, Jr, M D, B Wallace Hamilton, M D, Clarence G Bandler, M D, Denver M Vickers, M D, John L Edwards, M D, John T Donovan, M D, Walter T Heldmann, M D, and Eugene H Coon, M D

Section 141 (*See 19, 66*)

Reference Committee on Report of the President

DR PHILIP D ALLEN, *New York* Your Committee notes with approval your President's comments regarding malpractice insurance, but deems no action necessary on our part as it will be completely handled by another committee We note with concern the President's feelings regarding advertising in the NEW YORK STATE JOURNAL OF MEDICINE We feel that publication of the formula should be at least a minimum requirement for advertising accepted by our JOURNAL Members at large are known to disapprove of the advertising policy as presently conducted by the STATE JOURNAL.

The various cultists are at present, as always, clamoring for recognition, and continued vigilance on the part of the State Society is imperative to safeguard the health of the people

Your committee concurs in the need for organizing speakers' bureaus in the various county societies We agree with the President in believing that this is an excellent step in improving our public relations

We realize that attendance at some of the District Branch meetings has been extremely small as compared to the membership Your committee feels that it would be presumptuous to dictate the type of program for each particular district branch as conditions vary so considerably throughout the State However, consideration might be given to a change in the type of program in order to interest a great number of members in some of the district branches

We heartily agree with our President's suggestion regarding division of labor between President and President-Elect in the matter of attending district branch meetings

We agree with the President that the number of trustees should be increased, and we also agree that the tenure of office should be limited to two terms Your committee heartily approves of our President's recommendation that we all support and cooperate with the World Medical Association

In the President's supplementary report he recommends that the Council be empowered to take necessary steps to prepare for emergency defense The motion made by Dr Anderton that the President be empowered to appoint a Committee for National Defense is in line with this thought Your Committee feels that the New York State Medical Society should immediately embark on a plan for emergency medical defense We, therefore, recommend that the House of Delegates empower the Council to participate in this important activity and that the President appoint a committee for disaster preparedness We further recommend that this committee act in conjunction with adjacent state committees to formulate details for mutual emergency medical care

In conclusion, the President's report is most thorough and complete, and we heartily urge that our members familiarize themselves with it

Mr Speaker, I move the report be accepted

DR WILLIAM KLEIN, *Bronx* I second the motion

SPEAKER ANDRESEN There is one point there that I don't think we can consistently vote upon, and

that is the recommendation that the Board of Trustees be increased to nine That was disposed of yesterday

DR. JAMES F ROONEY, *Trustee* I don t think the Committee has many any recommendation in regard to that They approved the President's recommendation.

DR. ALLEN That is right.

DR. ROONEY But the only recommendations they made were two and they were the last two in relation to this question of national defense, so I think the House can perfectly well adopt the report because it does not embody any recommendation

SPEAKER ANDRESEN It embodies approval of something we did not approve yesterday

DR. ROONEY I don't think that is effective because the action has already been taken by the House, and it is not a reconsideration Furthermore it is not a recommendation They merely approve of the proposal. They had an opportunity of discussing it, and they approved it, but I don t think under any circumstances we should eliminate that in courtesy to our President. I am in favor of having it remain as is, and I can see no reason why if the only recommendations they submit for adoption are the two recommendations concerning national defense, those should not be passed upon separately, and then approve the report as a whole.

PRESIDENT BAUER May I comment on my own report? I assure you I have no idea of taking advantage of the recommendations of the Committee

I think the whole thing could be settled very easily if the Committee would just insert, 'but in view of the fact that this matter is being handled by another committee, no action is recommended

DR. PETER J DI NATALE, *Genesee* Was handled by another committee

PRESIDENT BAUER Yes just interpolate those words and that covers it.

DR. ALLEN On behalf of the Committee I insert it.

DR. THOMAS H. MCGAVACK *Section Delegate* You accept it, and I second it.

SPEAKER ANDRESEN There were two recommendations or only one?

DR. ALLEN There were two embodied in the report regarding emergency national defense.

DR. ROONEY One was the matter of the plan and the other was referring it to the Council. There were two separate recommendations.

DR. ALLEN Yes.

SPEAKER ANDRESEN Shall we vote on those separately or shall we vote on them together?

CHORUS Together

SPEAKER ANDRESEN I think we can vote on them together

The question was called, and the motion was put to a vote and was unanimously carried as amended.

Section 148 (*See 8*)

Report of Reference Committee on Report of Planning Committee for Medical Policies

DR. THOMAS M D ANGELO *Queens* The entire report of the Planning Committee for Medical Policies should be required reading for all members of the New York State Medical Society It shows the tremendous amount of work, time, and energy that the officers and committee members give to the Medical Society to protect the interests of the entire membership

This report is divided into six main subdivisions. The first two, namely preamble and organization are essentially the same as when the Committee was created in 1947 Since the committee has carried on its work so smoothly under the present organization, it was not necessary to change that organization.

Section 3 deals with the reorganization of the district branches. This section outlines the history of the formation of the branches and the work that these branches have carried on in the past Their study has shown that in many instances the present organization and activities of the district branches as now constituted do not meet the requirements of organized medicine at the present time. This has brought about the formation of separate organizations in various portions of this State to supplement the work of the district branches. Such organizations are especially active in the Eighth District Branch and the New York City area The Committee has reached no definite conclusion and asked that further and continuous study be made before the organizational setup and geographic redistribution of the district branches is changed Your Reference Committee approves the recommendation of the Planning Committee that 'in those district branches where the interest and sentiment now exist for further functioning of the district branches in serving the interests of its membership a council, or similar body be set up patterned on the successful experiment of the Eighth District Branch It should be so organized as to come within the framework of the Constitution and Bylaws of the State Society It should be carefully administered and supervised so that whatever actions are taken and whatever activities are promoted are cleared at the top through the Council of the State Society Your Reference Committee also approves the recommendation that from time to time appropriate publicity be given this movement in our STATE JOURNAL.

In other words, your Reference Committee recommends that the study be continued.

DR. JAMES F ROONEY *Trustee* I second it.

There being no discussion the motion was put to a vote and was unanimously carried.

DR. D ANGELO Section 4 deals with group practice At the meeting in Buffalo of the House of Delegates in May 1944 there was referred to the Planning Committee by the Council a resolution which asked that a study be made of group practice regulations. The Planning Committee gave this resolution extensive study Your Reference Committee does not intend to outline this study to the House of Delegates. Every member should especially read this portion of the report. The Committee has taken no definite action and made no definite recommendation because the American Medical Association is now studying this matter and some report will be made to the House of Delegates of the American Medical Association in June. The Planning Committee has outlined and codified in a large measure the rules and regulations which now exist concerning group practice One can sense the opinions of the members of the Planning Committee with respect to these rules and regulations but they have wisely refrained from coming to a definite conclusion until the American Medical Association has rendered a report on this subject

With respect to hospitals, medical schools, and private practice the Committee has taken a definite and vigorous stand It views with alarm the formation of group clinics controlled by hospitals and medical schools and the Reference Committee heartily endorses the action of the Planning Committee in vigorously protesting and opposing such activities.

Section 5—Progress of State and County Hospital Construction and Expansion Program This portion of the report is a continuation of the study that the Planning Committee undertook several years ago Very little progress has been made during the past year in New York State to implement the construction and expansion of the State and county hospital program The Committee unanimously approves the decentralization of this program We approve the recommendation that the hospitals constructed under this plan must have a regularly constituted medical board just as in any general hospital, and that all medical policies, staff appointments, ratings, and such other prerogatives and functions as properly belong to a medical board be assigned to the medical board and be their responsibility

I move the adoption of this portion of the report

DR JAMES F ROONEY I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

DR. D'ANGELO Section 6—Legislation—State and National We approve the recommendation of the Planning Committee that this House of Delegates again reaffirm their policy in opposition to the Wagner-Murray-Dingell Bill and similar legislation which would impose any system of national compulsory sickness insurance and socialized medicine on this country Also that hospital and medical functions within the Federal government be under medical control We also agree with the Planning Committee with regard to the Taft-Smith-Ball-Donnell Bill Number 8545 for their reaffirmation of a recommendation adopted in 1947 that we withhold full approval of the bill and emphasize our agreement with its general philosophy and purposes

I move the adoption of this portion of the report

DR. DWIGHT V NEEDHAM, *Onondaga* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

DR D'ANGELO In conclusion, your Reference Committee wishes again to call the attention of the entire membership of this Society to this important report. It urges the members of this House of Delegates to report to their county societies the contents of this report so that all the members of our Society can be fully acquainted with the policies and recommendations that are embodied in this report

I move the adoption of the report as a whole

DR. GEORGE C ADIF, *Westchester* I second it.

There being no discussion, the motion was put to a vote and was unanimously carried

Section 143 (*See 91*)

Report of Reference Committee on Report of Planning Committee for Medical Policies Redistricting District Branches

DR THOMAS M D'ANGELO *Queens* Resolution presented by Dr S R Monteith, of Rockland, Redistricting District Branches

"WHEREAS, Article 11, Section 3, of the Constitution of the Medical Society of the State of New York states,

'Changes in the number of membership of these district branches may be made by a two-thirds vote of the House of Delegates at any annual meeting',

and

"WHEREAS, the district branches as at present constituted do not include in all instances counties with similar problems in economics and public relations, and

"WHEREAS, the activity of the Eighth District Branch has demonstrated during the past year the organizational value of the district branch, therefore be it

"*Resolved*, that the House of Delegates of the Medical Society of the State of New York refer with power to act to the Council the matter of redistricting the county medical societies into district branches with the creation, if necessary, of a Ninth District Branch"

Your Reference Committee approves this resolution, and I so move

DR. HARRY C GUESS, *Erie* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 144 (*See 34*)

Report of Reference Committee on Report of Planning Committee for Medical Policies State Legislation Qualifying Title "Dr"

DR THOMAS M D'ANGELO, *Queens* On the resolution introduced by Dr Frederick A Wurzbach, Jr, reading

"WHEREAS, in the healing arts it has been traditional in America to associate the title 'Dr' with Doctors of Medicine, and

"WHEREAS, in the past decade others than licensed Doctors of Medicine have been misleading the public by the unqualified use of the title 'Dr on signs and stationery, and

"WHEREAS, such common practice is deleterious to the health of the public, therefore be it

"*Resolved*, that it be made mandatory by State law for all licensed practitioners of medicine and the allied healing arts to append to their names the degree which is recognized by license together with the state license number, and be it further

"*Resolved*, that the House of Delegates of the New York State Medical Society direct the Legislative Committee to draft a bill fulfilling the intent of these resolutions and introduce it for enactment into law at the next session of the New York State Legislature"

The Reference Committee has studied this resolution and recommends, first, certain changes in the wording of the resolution In the first "WHEREAS" it adds the word "largely" so that it now reads

"WHEREAS, in the healing arts it has been traditional in America to associate the title 'Dr' largely with doctors of medicine"

It eliminates the second "WHEREAS" entirely because its intent is embodied in the third "WHEREAS" and in the third "WHEREAS" the Committee has changed the word "deleterious" and substituted the word "confusing" so that it now reads

"WHEREAS, such common practice is confusing to the public"

In the first "*Resolved*" portion, the Committee has deleted the word "Medicine" and the word "allied" and it has eliminated that portion which would require a State license number, so that it now reads

"*Resolved*, that it be made mandatory by State law for all licensed practitioners of the healing arts to append to their names the degree which is recognized by license"

Your Committee approves the resolution in principle and refers the matter to the Council for study and implementation I so move

DR HARRY C GUESS, *Erie* I second the motion

DR ROONEY I just briefly want to say that I am

very glad to learn from the chairman of the Reference Committee that the medical profession is the one who in the common mind and in the common language are the only ones entitled to the title Doctor I have found out in the last fifteen years that our actual title is Doc.' One of these recommendations is very valid, the other thing is taken care of in the law of the State of New York, in providing that anybody who uses the title Doctor being unauthorized by an approved degree is guilty of a misdemeanor It is not enforced but there it is

The second thing is this I think one of the recommendations they make is most important that if the title of Doctor is used—and you know gentlemen we have an enormous number of doctors of philosophy who like to appear not alone to the public but to congressional hearings and the like as doctors of medicine—you should use 'Medical Doctor or Doctor of Medicine I think that the American Medical Association should take some cognizance of this thing and something should be done about it I heartily approve of the proposal of the Committee

There being no further discussion the motion was put to a vote and was unanimously carried

Section 145 (*See 39*)

Report of Reference Committee on Report of Planning Committee for Medical Policies U S Participation in the World Health Organization

DR. THOMAS M. D ANGELO *Queens* On the resolution introduced by Dr Reginald A Higgons, of Westchester County Medical Society on United States Participation in the World Health Organization

'WHEREAS the World Health Organization was created under the auspices of the United Nations to meet medical and health problems on an international scale and

'WHEREAS with present day means of transportation diseases or epidemics in one part of the world are a menace to all other parts and

"WHEREAS the bill to provide United States participation in the World Health Organization was passed by the Senate (S.J Res 93) last July and reported favorably by the House Foreign Affairs Committee (H.J Res. 161) and

"WHEREAS on March 12 by a vote of 5 to 2 the House Rules Committee decided not to bring this bill before the House for action and

WHEREAS, this bill is still withheld by the House Rules Committee and

'WHEREAS, prompt action must be taken if the United States is to participate in the first assembly of the World Health Organization to be held in Geneva during June now therefore be it

'RESOLVED, that the House Rules Committee be petitioned by the Medical Society of the State of New York to present this bill for a vote by the House of Representatives in order that the leadership of American Medicine and Public Health may have its rightful voice in dealing with international health problems.

Your Reference Committee approves this resolution, and I so move

DR. DWIGHT V NEEDHAM *Onondaga* I second the motion

There being no discussion the motion was put to a vote and was unanimously carried

Section 146 (*See 35*)

Report of Reference Committee on Report of Planning Committee for Medical Policies Creation of a Junior Membership Classification in County Societies and State Medical Societies on Reduced Assessment Basis

DR THOMAS M D ANGELO *Queens* This resolution asks that the Medical Society of the State of New York and its component county societies set up a new classification of members known as Junior Membership for Interns Residents, and Assistant Residents in Hospitals. These individuals for an annual individual fee of $5 00 would be eligible to malpractice insurance under the Group Plan

Dr McKay has asked permission to withdraw this resolution without prejudice Your Committee approves the withdrawal of this resolution by Dr McKay without prejudice and I so move

DR. EDWIN A GRIFFIN *Kings* I second the motion

There being no discussion the motion was put to a vote and was unanimously carried

DR. W GUERNSEY FREY, JR. *Assistant Secretary*) On one of Dr D Angelo s first recommendations in regard to the districts being redistricted and that that matter be referred to the Council of course the Constitution and By laws of the State Society provide provide for what our districts shall be Are we to consider this as notice of an amendment to the By laws?

DR D ANGELO It is referred to the Council for study

SPEAKER ANDRESEN The Council could introduce such an amendment next year

DR. D ANGELO They would probably refer it to the Planning Committee for further study That is what they are doing now

I move the adoption of the report as a whole

DR. WILLIAM KLEIN *Bronx* I second it

There being no discussion the motion was put to a vote and was unanimously carried

Section 147

Report of the Scientific Awards Committee

SPEAKER ANDRESEN We will go back now for a minute As you remember we called for the report of the Scientific Awards Committee before, and Dr Post was not here Dr Post has now come in and will make that report at this time.

DR. CHARLES D POST, *Onondaga* The Committee has spent considerable time in the Scientific Section The exhibits are of an exceedingly high character, and for that reason the Committee has had considerable trouble in coming to a definite award status However we wish to submit the following report

SCIENTIFIC AWARDS

First Prize Dr Gilbert Dalldorf Albany—Vaccination Against Tuberculosis with BCG Vaccine

Second Prize Dr Lee A Hadley Syracuse—Intervertebral Foramen Studies

Honorable Mention Dr B S Oppenheimer Dr E. T Oppenheimer and Dr A I Stout College of Physicians and Surgeons Columbia University—Sarcomas Induced in Rats by Implanting Cellophane

CLINICAL AWARDS

First Prize Dr William Benham Snow Columbia Presbyterian Medical Center—A Program in Physical Medicine

Second Prize Dr David S Graubard Dr Milton H Waldman, and Dr Raphael W Robertozzi

Reconstruction Hospital, Post-Graduate Medical School and Hospital—Intravenous Procaine
Honorable Mention Dr Harry Wallerstein and Dr Alfred Schwartz, Jewish Memorial Hospital, Morrisania City Hospital, and Queens General Hospital—Management of Erythroblastosis

CHARLES D POST, *Chairman*
JOHN SCUDDER
J L MOOREHEAD

SPEAKER ANDRESEN This is informative, and we thank the Committee for its report

I am informed that the House has to make those awards so a motion would be in order to approve the recommendations and make the awards

DR EZRA A. WOLFF, *Queens* I so move

DR FENWICK BEEKMAN, *Assistant Treasurer* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried.

Section 148 (See 11)

Report of Reference Committee on Report of Council, Part IV Public Health Activities B—Cancer

DR THOMAS H MCGAVACK, *Section Delegate* Your Reference Committee has carefully studied in detail Part IV of the Report of the Council relating to Public Health Activities B and commends the vigorous approach that each Subcommittee has made to its particular task.

The Subcommittee on Cancer has filed a detailed report of its activities and plans, which the Reference Committee recommends for endorsement by the House of Delegates I move the adoption of this part of the report

DR EDWIN A. GRIFFIN, *Kings* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

DR. MCGAVACK The Subcommittee on Cancer conjointly with the State Department of Health has established fellowships for the postgraduate education and training of physicians in fields related to the control of cancer, and has placed such opportunity within the reach of every physician in the State by communication of full details to the secretary of every county medical society The extent of this work and the scope of lecture program of the Subcommittee on Cancer call for special thanks from the House of Delegates, and the Reference Committee makes this recommendation. I move the adoption of this portion of the report

DR. WILLIAM T BOLAND, *Chemung* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 149

Report of Reference Committee on Report of Council, Part IV Public Health Activities B—BCG Immunization

DR THOMAS H MCGAVACK, *Section Delegate* The BCG Advisory Committee, representing the State Department of Health and the Council Committee on Public Health and Education, is in process of completing a report on the BCG Program. This comprehensive presentation of the subject compiled for the benefit and use of all the physicians of New York State deserves the endorsement of the House of Delegates, and your Reference Committee so recommends

I move the adoption of this part of the report

DR MOSES H KRAKOW, *Bronx* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 150

Report of Reference Committee on Report of Council, Part IV Public Health Activities B—Hard of Hearing and the Deaf

DR THOMAS H MCGAVACK, *Section Delegate* Your Reference Committee duly notes and highly commends the progressive steps taken by the Subcommittee on Hard of Hearing and the Deaf for establishing new hearing centers and their further plans for financing an adequate program for the conservation of hearing

I move the adoption of this part of the report

DR DONALD MALVEN, *Washington* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried.

Section 151

Report of Reference Committee on Report of Council, Part IV Public Health Activities B—Mental Hygiene

DR. THOMAS H MCGAVACK, *Section Delegate* The Subcommittee on Mental Hygiene has made a detailed survey of existing facilities and methods for the care of psychologically and mentally maladjusted ill patients As a result, the members of said committee believe a more comprehensive approach to the entire subject is necessary, particularly in view of current scientific developments in the field of psychiatry and mental hygiene On the basis of this belief, the action of the Subcommittee, approved by the Council, in proposing a nine-membered Mental Health Council of New York State Department of Mental Hygiene deserves the wholehearted endorsement of the House of Delegates, and your Reference Committee requests and recommends the same

I move the adoption of this portion of the report

DR WILLIAM B RAWLS, *New York* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

Section 152

Report of Reference Committee on Report of Council, Part IV Public Health Activities B—Rheumatic Fever

DR THOMAS H. MCGAVACK, *Section Delegate* The newly formed interlocking Subcommittee on Rheumatic Fever is developing plans for advising and assisting the ever increasing number of agencies and groups interested in that disease. Theirs is a praiseworthy program which should receive wholehearted support from the House of Delegates, and the Reference Committee makes such a recommendation

I move the adoption of this part of the report

DR W T BOLAND, *Chemung* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

Section 153 (See 8, 142)

Report of Reference Committee on Report of Council, Part IV Public Health Activities B—Group Practice

DR THOMAS H MCGAVACK, *Section Delegate* The Subcommittee on Group Practice of the Council has filed a rather extensive, informative report con-

cerning existing rules and regulations covering partnerships and groups in practice It has moreover, called attention to problems which must be solved in standardizing this type of cooperative effort among the physicians. Emphasis in this report has also been placed on the importance of maintaining the identity of the individual physician in group and hospital practice

Your Reference Committee strongly recommends that each member of the House of Delegates study this report in complete detail in order that not only *may he be fully informed himself but also that he* may acquaint his constituency concerning this matter which may eventually predetermine the course of the professional life of each one of us For instance some conflicts exist between Principles and Ethics as formulated by the American Medical Association and existing laws in the State of New York. These and other matters need further study, clarification and practical application to the problems of group practice

For these reasons your Reference Committee concurs in the recommendation of the Subcommittee on Group Practice that ' this matter should be given detailed and serious study and further recommends ' that it be referred to the Council for appropriate action

We move the adoption of this part of the report.

DR. SAMUEL Z FREEDMAN *New York* I second it.

There being no discussion the motion was put to a vote and was unanimously carried

Section 154 (*See 58*)

Report of Reference Committee on Report of Council Part IV Premarital Blood Tests

DR. THOMAS H MCGAVACK, *Section Delegate* The following resolution was submitted to the House of Delegates on Monday morning, May 17 by Dr G S Philbrick of the Niagara County Medical Society

'WHEREAS under the present public health law thirty days are allowed in which applicants may apply for a license for marriage and

'WHEREAS after receiving a license for marriage sixty days are allowed for the applicant to exercise his right to use such license, and

'WHEREAS, this gives the applicant ninety days in which he or she may become infected which in effect partially nullifies the benefits of this law therefore be it

'*Resolved*, that this House of Delegates go on record as being in favor of a shorter period of time between examination and consummation of the marriage, and the matter be referred to Council for appropriate action.

Your Reference Committee moves the approval of this resolution by the House of Delegates

DR. HOMER J KNICKERBOCKER, *Ontario* I second the motion

There being no discussion the motion was put to a vote and was unanimously carried

DR. MCGAVACK Now your Reference Committee moves the adoption of the report as a whole

DR. WILLIAM KLEIN I second it

There being no discussion the motion was put to a vote and was unanimously carried

SPEAKER ANDRESEN Thank you, Dr McGavack

Section 155 (*See 29 86*)

Report of Reference Committee on Reports of Board of Trustees and the Treasurer' Resolution Exempting from Dues Payment by Men in Military Service

DR. IRWIN E. SIRIS *Kings* Concerning the resolution dealing with exemption from dues payment by men in military service introduced by Dr Wolff, *of Queens*

'WHEREAS exemption from payment of county society dues and State Society assessments by members in military service was predicated on temporary service for duration of hostilities and

WHEREAS, hostilities have now terminated and

'WHEREAS almost without exception members in temporary service have returned to civilian practice therefore be it

Resolved that the resolution adopted by this House of Delegates recommending exemption from payment of county society dues and State Society assessments by members in service be declared inoperative as of December 31 1948

We recommend that the resolution be amended to read as follows

A That members of the armed forces still in *service on a temporary basis or who may be called* to the services in the future on such basis have their dues remitted

B That the dues no longer be remitted to *members in the various services who have* accepted permanent commissions in the regular Army Navy or Air Force

C Authority is hereby given to the Council to use their discretionary power in any specific case not apparently covered by paragraphs A and B

I move the adoption of this report

DR. JAMES F ROONEY *Trustee* I second it

DR. HOMER J KNICKERBOCKER *Ontario* Would it not be best to place the term armed services' there instead of mentioning the regular Army Navy or Air Force ? I think it would

DR. ROONEY May I answer Dr Knickerbocker through you, Mr Speaker?

SPEAKER ANDRESEN You may

DR. ROONEY That matter was referred to the Reference Committee again for their consideration. As you may remember in the original resolution the language was armed services. That is ambiguous It is very ambiguous and it was suggested it be clarified. I think that the Committee afterward conferred with Dr Lull the secretary of the American Medical Association and this language was finally agreed upon as being the accurate method of making this exception

DR. KNICKERBOCKER In deference to my friend Rooney, I will withdraw and subside

DR FENWICK BEEKMAN *Assistant Treasurer* The Public Health is left out of there

SPEAKER ANDRESEN That is not an armed service

DR. ROONEY The point of fact is that the original resolution specified 'remission for those members of the armed forces of the United States That included the Public Health Service at that time and during the progress of active hostilities. Although the war is still on and it has never been declared over and in addition there is an emergency the Public Health Service reverted to the Department of the Treasury It is no longer even an affiliated service so there was no provision whereby that would come within the purview of the original resolution, Dr Beekman

DR BEEKMAN I stand corrected

There being no further discussion the motion was put to a vote and was unanimously carried

Section 156

Report of Reference Committee on Report of Council, Part V Public Health Activities C—Rehabilitation

DR PHILIP L FORSTER, *Section Delegate* The Subcommittee on Rehabilitation under the chairmanship of Dr O W H Mitchell reports continued satisfactory relationship between the Medical Society of the State of New York and the various government agencies concerned with rehabilitation No change in policy or procedure is reported

The Reference Committee is in receipt of a communication from G S Bohlin, Director of the New York State Education Department, Division of Vocational Rehabilitation Mr Bohlin specifically mentions the clarification and extension of fee schedule, specifying amounts which may be paid for certain authorized medical services He calls attention to the work being done by Dr Gordon D Hoople's Subcommittee on Hard of Hearing and the Deaf toward the establishment of centers where adequate diagnostic and technical help can be made available Mr Bohlin suggests that more physicians make a practice of referring to the Division at an early date those patients who are confronted with employment limitations because of any permanent disability arising from illness, injury, or deformity

Your Reference Committee recommends approval of this work, and I so move

DR MADGE C L MCGUINNESS, *New York* I second it

There being no further discussion, the motion was put to a vote and was unanimously carried

Section 157 (*See 12*)

Report of Reference Committee on Report of Council Part V Public Health Activities C—Geriatrics

DR PHILIP L FORSTER, *Section Delegate* The Subcommittee on Geriatrics, with Stephen R Monteith as chairman, has communicated with the deans of the medical schools in New York State, inquiring as to whether or not special courses were given or planned in geriatrics The responses at first indicated that the medical schools felt no definite need for such courses nor foresaw the likelihood of their establishment, but in a supplementary report of the Subcommittee on Geriatrics, which was just made available, it is learned that the deans of each of New York State's medical schools have assured the Study Committee of a keen desire to enhance their research programs in geriatrics problems and are only waiting for necessary monies to expand their activities

At a public hearing of the New York State Joint Legislative Committee on Problems of the Aging, the chairman of the Subcommittee on Geriatrics presented a report which was favorably received This report was approved by the Council Committee on Public Health and Education and the Council, and copies of the report are available at this time at the exhibit of the Medical Society of the State of New York. The Subcommittee is continuing its activities in close cooperation with medical schools and government and voluntary agencies The Committee notes increased interest in the subject of geriatrics and the paying of more attention to the care of adult chronically ill, including special clinics and home care services, provision for postgraduate and research studies in medical schools, as well as participation in government and voluntary agencies in the establishment of institutions

Your Reference Committee points to the need of publicity concerning the work of the State Society and its component counties Attention is called to the fact that the Montefiore Hospital in New York City has been caring for chronically ill persons at home at a very much reduced rate, and that Bellevue is considering the advisability of treating convalescents under similar circumstances This should help reduce the acute shortage of hospital beds in addition to saving considerable money for the family

It is recommended that the medical profession take a more active and aggressive role in promoting active interest of the profession in the care of the older age groups as well as the development of more adequate institutional facilities *in connection with existing hospitals* for such care Emphasis is placed on the responsibility of the profession itself to assume a more active leadership role

Your Reference Committee recommends approval of the work of this Subcommittee, and I so move

DR HOMER J KNICKERBOCKER, *Ontario* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 158

Report of Reference Committee on Report of Council, Part V Public Health Activities C—Nutrition

DR PHILIP L FORSTER, *Section Delegate* Following a suggestion by the New York State Commissioner of Health, Dr Herman E Hilleboe, a Subcommittee on Nutrition was appointed last October, with Dr Norman S Moore as chairman The Subcommittee made recommendations which were presented to the Council on December 11, 1947, and approved

1 Support the creation of a Nutrition Bureau in the State Department of Health

2 Support the plea to the curricula committees of the various medical schools of the State to introduce more subject matter concerning nutrition in medical education

3 Inform physicians of the State regarding recent advances concerning nutrition and stimulate their interest

(*a*) Educational articles in the NEW YORK STATE JOURNAL OF MEDICINE, using as a guide the *Handbook of the Food and Nutrition Board*

(*b*) At annual meetings of medical societies, work in special reports on the anthropologic aspects of nutrition in various cultures, and particularly our own culture, as a means of stimulating interest

(*c*) In the Council Committee on Public Health and Education include more programs on the subject

(*d*) Disseminate information regarding the importance of nutrition in all age groups, to the specialists in obstetrics, pediatrics, and geriatrics particularly, and stress the value of nutrition in all disease conditions

4 In cooperation with the State Health Department provide stipends for doctors who take advanced work in nutrition similar to the plans developed for special training in the cancer program

5 Support the State Health Department's request and the Food Commission's request for appropriations for research to be carried out at places where qualified nutrition clinics and educational facilities are available

The Subcommittee also approved, with minor revisions, the proposed program for the Bureau of Nutrition to be established in the State Department of Health

Your Reference Committee recommends approval of the work of this Subcommittee, and I so move.

DR. SAMUEL B BURK *New York* I second the motion.

There being no discussion, the motion was put to a vote and was unanimously carried

Section 159

Report of Reference Committee on Report of Council Part V Public Health Activities C—Physical Medicine

DR. PHILIP L. FORSTER, *Section Delegate* A Subcommittee on Physical Medicine under the chairmanship of Dr Charles M Allaben was appointed last June and held two meetings in September and October to consider the qualifications and licensing of physiotherapists in New York State A report with recommendations was prepared and submitted to the Council on December 11 the Council deciding that further study should be given this matter

Your Reference Committee recognising the many problems involved in trying to straighten out this perennial headache feels that more time and thought must be given this subject and that decisions must be arrived at only for the best interests of the ill patient.

Your Reference Committee recommends approval of the work of this subcommittee and urges the continuation of this committee. I so move

DR. MADGE C L. MCGUINNESS *New York* I second the motion

There being no discussion the motion was put to a vote and was unanimously carried

DR. FORSTER Your Reference Committee desires at this time to commend Dr Mitchell and his committees for the excellent work they have done. They have made an invaluable contribution to the medical profession as well as to the general public of this State.

Mr Speaker I move the adoption of the report of your Reference Committee as a whole

DR. STEPHEN R. MONTEITH *Rockland* I second it.

There being no discussion the motion was put to a vote and was unanimously carried

Section 160 (*See 46*)

Report of Reference Committee on Report of Council, Part V Creation by Medical Society of the State of New York of a Special Committee on the Problems of Alcoholism

DR. PHILIP L FORSTER *Section Delegate* We have several resolutions on alcoholism, all from Erie County The first requests the creation by the Medical Society of the State of New York of a Special Committee on the Problems of Alcoholism

'WHEREAS, individuals manifesting the complex symptoms of alcoholism and compulsive drinking are sick persons in need of enlightened, sympathetic, and effective medical care, alcoholism being a disease to be dealt with as such and

"WHEREAS, the broad question of the prevention and treatment of chronic alcoholism is a matter of immediate and deep concern to the medical profession of every community of the State of New York, the medical profession being conscious of its obligation to assist in reducing the incidence of chronic alcoholism, in providing adequate facilities for medical and institutional care and rehabilitation of these sufferers and in re-establishing the chronic alcoholic, both socially and economically, and

'WHEREAS there exists widespread demand among members of the medical profession of New York State that the Medical Society of the State of New York assume the leadership in developing within medicine's ranks a well-balanced program—preventive therapeutic and rehabilitative—and furthermore in stimulating increased interest in this vital problem by all component county societies now, therefore be it

'*Resolved* that the Medical Society of the State of New York represented in this duly convened Annual Meeting of its House of Delegates, hereby places itself on record as strongly favoring, approving and requesting that there be established at the earliest possible date through appointive action by the President of such State Society a *Special Committee on the Problems of Alcoholism* such Special Committee to be representative geographically of all populous sections of the State and be it further

Resolved, that the Medical Society of the State of New York through the agency of the proposed *Special Committee on the Problems of Alcoholism* or the Council of the State Society urgently request each component county medical society in the State to appoint a local Special Committee on the Problems of Alcohol to function actively in association with its work in the field of public health.

Your Reference Committee recommends adoption of this resolution I so move

DR. WILLIAM KLEIN *Bronx* I second the motion

DR. HARRY ARANOW, *Councilor* This is really not a discussion, but it is to let you know that the legal profession in New York and several organizations including the Academy of Medicine are already making a study of the subject, and I know that the Medical Society of the State of New York is going to be invited to join

SPEAKER ANDRESEN This will fit right into that then?

DR. ARANOW Yes

SECRETARY ANDERTON This subject would have been I am sure, discussed by Dr Mitchell chairman of the Public Health and Education Committee, except that he is in conference now with the State Commissioner of Health

This subject of alcoholism has been referred previously to the Public Health and Education Committee and through them to the Committee on Psychiatry I am quite sure I am quoting Dr Mitchell's feeling that this subject heartily deserves our support but it should be referred to the Public Health and Education Committee through the Council rather than to establish a whole new committee for it. We have a lot of committees already I don't know how many there are

DR. JAMES F ROONEY *Trustee* I move to amend the recommendation of the Reference Committee that the reference be to the Council and the subsequent assignment to the already existing committees of the Council for continuation of this work.

DR. HARRY C GUESS *Erie* In February of this past year we sent a recommendation to the State Society That recommendation went to the Council They in turn collaborated with the Academy of Medicine of New York City This problem now is so large and so timely that the men in Erie County who have given a lot of time to this particular subject feel that if they had a special committee of men, representatives from the various parts of our State and not placed under the Mental Hygiene Subcommittee where it is now that they would be able to do

a much better job in eliciting help from civic organizations and thereby do it quicker This committee can work right with the subcommittee under Dr Mitchell, we have no objections to that at all, but we do believe that we can get better public relations if we have five or six men appointed by the President who may sit in on their meetings and thereby accomplish this thing a little bit faster than the way we have been doing We do not wish to take any work away from any subcommittee, but we do feel that the time is ripe to do something with the general committee I am sure if you are thinking about the expense, that there will be no expense with this type of committee that is formed because these men are all sincere in their efforts toward the treatment of alcoholism, not as a mental condition, but as either a physical or a psychologic condition in our State or in our general hospitals throughout the country

With that in mind, we feel sincerely that this committee will not interfere with the work of other committees of the State Society and it will not cost the Society anything, but that eventually we will gain by it in that the treatment of alcoholism will fall under the general doctors in each county rather than staying in mental hygiene or in the State institutions We in Erie County are very sincere when we ask that this committee be formed

SPEAKER ANDRESEN The discussion is on the amendment to refer to the Council

DR ROONEY I would like to ask the unanimous consent of the House to withdraw my proposed amendment

SPEAKER ANDRESEN Is there any objection?

There was no reply

SPEAKER ANDRESEN The motion to refer is withdrawn

DR. ROONEY Now I would like to propose, in view of what has just been stated by the preceding speaker, that the President be requested to appoint a special committee of six from the members of the House to carry on the work recommended in the original resolution

DR THOMAS MCGAVACK, *Section Delegate* In conjunction with the Council

DR ROONEY In conjunction with the Council

DR STEPHEN R MONTEITH, *Rockland* I will second that

DR. HARRY ARANOW, *Councilor* What is the original motion?

DR FORSTER They would like to have a committee appointed

DR ARANOW It does not give the number?

DR FORSTER No

SPEAKER ANDRESEN It does not give the number It only recommends the appointment of a committee and does not give the number Dr Rooney's motion specifies a committee of six

DR ROONEY Which is the number suggested by the preceding speaker, Dr Guess

DR BENJAMIN F GLASSER, *Queens* I would like to know what Dr Rooney really means when he specifies the appointment of a committee from members present in this House Why does he want to limit it to members of this house?

DR. ROONEY Ordinarily when the House of Delegates wants a special committee appointed—and we carried on in the same manner on the question of the basic science law study—it is requested that that committee be appointed from the members of the House by the President It is immaterial to me but, gentlemen, it has been my experience that if you have a special committee of this sort from the House to operate in conjunction with the Council the judgment of those representatives of the various districts of the State who have already sat in at the House discussion is likely to be much more productive of worthwhile material than this question of choosing it from the membership at large That is the reason

DR GLASSER Agreed

The question being called, the amendment was put to a vote and was unanimously carried

SPEAKER ANDRESEN Now we are on the recommendation of the Committee as amended Is there any discussion?

The question was called, and the motion was put to a vote and was unanimously carried

Section 161 (*See 51*)

Report of Reference Committee on Report of Council, Part V Study of Alcoholism Problem by State Department of Health

DR PHILIP L FORSTER, *Section Delegate* The next resolution is on the Study of Alcoholism Problem by the State Department of Health

"WHEREAS, alcoholism is an illness of individual and public concern, and

"WHEREAS, the estimated number of excessive drinkers in New York State is about 283,000, of whom 70,000 are chronic alcoholics, and the amount of suffering on the part of the patients and their dependents as a result of alcoholism is tremendous, and

"WHEREAS, the alcoholic is a sick person who often wants to be helped, but all of the causes of this illness are not known, and

"WHEREAS, medical facilities for the care and treatment of the alcoholic patient are woefully inadequate, and

"WHEREAS, the amount of money spent by government agencies in the ineffectual method of handling the alcoholic through prisons and penitentiaries, plus the amount spent for taking care of the dependents of these individuals, is considerable, now therefore be it

"*Resolved*, that the Governor and the Legislature of New York State be petitioned and urged to direct and authorize the State Department of Health, which is charged by the Public Health Law with safeguarding the health and life of the people of the State, to study the problem of the prevention and alleviation of alcoholism, and to devise methods and programs for the treatment and rehabilitation of chronic alcoholics, the Department to be provided with an adequate appropriation for this project, and, furthermore, that copies of this resolution be transmitted to the officials concerned for their favorable action"

Your Reference Committee recommends adoption of this resolution, and I so move

DR STEPHEN R MONTEITH, *Rockland* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 162 (*See 67*)

Report of Reference Committee on Report of Council, Part V Isotope Committee

DR PHILIP L FORSTER, *Section Delegate* The last resolution was introduced by Dr Laurance D Redway and Dr Norman S Moore

"WHEREAS, the policy of the United States Atomic Energy Commission is liberal with respect to the release of radioactive isotopes for research in general, and

"WHEREAS consequent upon this farsighted policy of the Commission many more radioactive materials will be handled by an increasing number of people and

WHEREAS the danger to technical personnel and the public through carelessness or lack of uniform protective measures in dealing with these materials will increase and

'WHEREAS, in the event of the emergency of mass radiation, immediate protective measures would be imperative now be it

'Resolved that the Medical Society of the State of New York, acting in the public interest instruct its Council to create an isotope committee for the purpose of coordinating the protective measures now being formulated by various scientific medical public health and industrial groups and through the educational channels of the Society familiarize the physicians of the State with all known protective measures applicable to peacetime uses of radioactive materials

Your Reference Committee recommends approval of this resolution, and I so move

DR. WILLIAM KLEIN *Bronx.* I second the motion

DR. JAMES F ROONEY, *Trustee* I think this should be referred to one of the quasi-standing committees of the Council or rather to the Council for reference to such committee Do you have any idea how many committees and subcommittees of the Council you already have, and remember a member of the Council must be the chairman of each of these committees? You have over 48 and I think you have provided for the assignment or creation of two or three more during the period of this session It seems to me that the wise thing to do is to refer *this to the Council. We are going to have* committees on the extension of the little toenail of the right foot pretty soon While this is a valuable thing and an important one—not that I am so seriously afraid we are going to have any particular atomic warfare in the very immediate or reasonably distant period—I think we ought to refer this to the Council, and I so move

SPEAKER ANDRESEN Will you accept that?

DR. FORSTER Yes

DR. STEPHEN R. MONTEITH, *Rockland* I will second it.

There being no discussion the motion as amended was put to a vote and was unanimously carried

SPEAKER ANDRESEN We thank you Dr Forstor

Section 163 (See 63)

Report of Reference Committee on Report of Council Part VI Economics

DR. EDWARD P FLOOD, *Bronx* Your Reference Committee has studied the report of the Council Committee on Economics and subscribes to its contention that many new factors are making their impression on the practice of medicine as we have known it and calls our attention to several of these

First, the continued controversy of the specialties of pathology anesthesia, physiotherapy and roentgenology with hospital administrators relative to their reimbursement of services rendered to holders of hospitalization insurance and beneficiaries of voluntary medical service plans. Your Reference Committee is in sympathy with the efforts of members of these specialties to remedy this inequity and calls to their support every member of organized medicine who is on a hospital staff

Unfortunately the members of these specialties are in a special category because they are on a salary basis without security of tenure and are faced with the realization that their positions can be readily filled by an ever increasing number of younger specialists eager for the salary and the professional prestige associated with or conferred by a title

Until the profession at large makes the members of these specialties independent by referring their private work to their individual offices rather than to the hospital laboratories they will not be able to compel hospital administrators to recognize the justice of their complaints.

The evils inherent in the employment of specialists by hospitals are obvious and should warn us against the extension of this practice to the major specialties such as surgery medicine, and obstetrics This is already accepted practice in the large teaching centers but recently has invaded the precincts of many so-called voluntary hospitals. While these directors are not, ostensibly in the practice of medicine, the hospital administration charges those who seek their care substantial fees which do not revert to these men Your Reference Committee condemns their attendance in any but service cases

The Council Committee notes the continued formation of lay organizations interested in many branches of medicine and, while it recognizes their advantages and the present limitation of their activities to case finding it is concerned with the possible further extension of their facilities into the realm of treatment

The Council Committee also takes note of the increased cost of illness but we must insist that medical care as such has not substantially contributed to the increase

The cost of hospitalization and the cost of nursing care has more than doubled in the past few years We should realize that private duty nursing can only be secured at the cost of $1 000 a month and insist upon group nursing to better distribute a necessity which has now become a very expensive luxury

We should encourage the movements such as those instituted by the Montefiore Hospital for Chronic Diseases for the extension of medical care to the home The average cost per patient day in most hospitals now approaches $16 If many hidden costs such as tax exemption, capital underwritings obsolescence and depreciation were recognized by hospital accountants as actual, the cost per patient per day would be nearer $20 The services of a physician a housekeeper and a visiting nurse may be secured for less than this if the patient were invalided at home as soon as the necessity for urgent hospital care is ended.

The Council Committee calls our attention to certain powerful minority groups in our profession who seek some form of federalized medicine. While many of these physicians may be idealists or ideologists, numbers of them are motivated by a desire for security I refer particularly to physicians who are on salary whose pension rights may be jeopardized by inflation or a drying of the wells of philanthropy These men are in a position to indoctrinate the future doctor from the earliest days of his student career and in many institutions do not hesitate to do so

The Council Committee asks for the continued support of the voluntary nonprofit insurance plans sponsored by the Society The individual physician should encourage his patients to make use of these plans and further we urge willingly make the sacrifice in time and patience necessary to the completion of essential reports

I move the adoption of this portion of the report

SECRETARY ANDERTON I second it

There being no discussion, the motion was put to a vote and was unanimously carried

Section 164

Report of Reference Committee on Report of Council, Part VI Public Medical Care

DR EDWARD P FLOOD, *Bronx* Your Reference Committee carefully considered the report of the Subcommittee on Public Medical Care as published in the annual report We note with approbation the continued cooperation of the Subcommittee on Public Medical Care with the representatives of the State Department of Social Welfare and those of the New York State Association of Public Welfare Officials, as well as the representatives of the medical consultants of the various local medical plans known as the Joint Committee

The Subcommittee wishes to emphasize again that its function is at a State level and that they cannot solve the problems, policies, and procedures of local welfare agencies The solution of such problems should be made at the level of the local welfare commission and county medical society The subcommittee notes that there are now 44 local medical consultants from the various counties who may act as a liaison between the local physicians and the local welfare administrations

Again the subcommittee notes that the majority of complaints received by them has been relative to the procedure of payment to patients for medical services There is an increasing tendency in the large communities for the patients to withhold what is paid them by the welfare agency for medical services and appropriate it to other uses The State Department of Public Welfare would have no objection to paying the physician directly, but the regulation of the Federal Security Board requires that such payments be made to the patients and not directly to the physician

While the Joint Committee is not unfavorable to a recommendation that the Federal Social Security Board be petitioned to change this regulation, it was brought to our attention by the chairman of the subcommittee that such a change would place the medical profession in an inconsistent position It was at the urging of organized medicine that, in order to maintain the traditional patient-physician relationship and to relieve the patient of the possible opprobrium inferred in not trusting him to reimburse the physician for professional services rendered that this regulation was originally adopted Your Reference Committee still holds this conception valid and recommends that the method of reimbursement be not changed by a petitioning of the Federal Social Security Board

The Reference Committee notes with satisfaction that the fee schedule for welfare patients has been substantially increased, but we hope that the citizenry will realize that these fees are nominal and represent a contribution of the medical profession to the general welfare

I move the adoption of this portion of the report

SECRETARY ANDERTON I second it

There being no discussion, the motion was put to a vote and was unanimously carried

Section 165 *(See 92)*

Report of Reference Committee on Report of Council, Part VI Practice of Medicine by Hospitals

DR. EDWARD P FLOOD, *Bronx* The Reference Committee had before it the resolution introduced by Dr B M Bernstein, of Kings, relative to the practice of medicine by hospitals

"WHEREAS, there is an increasing tendency on the part of hospitals to employ full-time directors of service in other fields of medicine in addition to those already in operation in radiology, pathology, and anesthesiology, and

"WHEREAS, such a program is a definite threat to the individual and private practice of medicine, and

"WHEREAS, such a plan would appear to place hospitals in the business of practicing medicine, and

"WHEREAS, such a procedure, if left uncontrolled and uncurbed, except in the matter of undergraduate teaching of medical students, might lead to unforeseen difficulties for the practice of medicine, therefore be it

"*Resolved*, that the Council be instructed to set up a special Hospital Relations Committee to study this problem and to use its efforts to prevent hospitals from practicing medicine and interfering with the private practice of medicine, and to use all moral and, if necessary, legal methods for this purpose"

The Reference Committee approves the intent of this resolution, but substitutes the following resolution

"*Be it resolved*, that the Council be instructed to refer this matter to an appropriate, existent committee of the Council to study this problem and to use its efforts to prevent hospitals from practicing medicine and interfering with the private practice of medicine and to use all moral and, if necessary, legal methods for this purpose"

I move the adoption of the report of the Reference Committee

DR STEPHEN R MONTEITH, *Rockland* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 166 *(See 68)*

Report of Reference Committee on Report of Council, Part VI Insurance Forms

DR EDWARD P FLOOD, *Bronx* We also had the resolution introduced by Dr Charles Gullo, of Livingston County, on Insurance Forms

"WHEREAS, physicians are asked to make out many illness and mortality forms of insurance companies, and

"WHEREAS, the filling of such forms often requires considerable time, and

"WHEREAS, these forms are generally never alike, be it

"*Resolved*, that the Council appoint a committee to meet with a committee of the Association of Life Insurance Companies for the purpose of standardizing the illness and mortality forms and thereby make them more brief"

The Reference Committee approves of this resolution, and moves its adoption I so move

DR. MOSES H KRAKOW, *Bronx* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 167 *(See 29)*

Report of Reference Committee on Report of Council, Part VI Voluntary Health Insurance Plan

DR. EDWARD P FLOOD *Bronx* Your Reference Committee has the resolution introduced by Dr Thomas M D Angelo of Queens County concerning voluntary health insurance plans recommending that the Medical Society of the State of New York advise its members not to become participating physicians in any voluntary health insurance plan unless it has been approved by the Medical Society of the State of New York

The Reference Committee is in complete accord with the purpose of this resolution and recommends its adoption. I so move.

DR. FRANK CERNIGLIA, *Queens* I second the motion.

SPEAKER ANDRESEN *The recommendation of the* Reference Committee, carrying with it the approval of the resolution, is before you for discussion

DR. ARTHUR A. FISCHL, *Queens* I am very much in accord with this resolution I might say that this resolution was not brought up before the Queens County Medical Society It is a resolution offered by Dr D Angelo himself

I might also say that there are so many ramifications of this particular problem. There is no punitive effort involved We in the metropolitan area, are confronted with this problem very seriously at present. There are approximately 3 000 participating physicians in two existing plans one of which has been approved by one or two county societies and the other had not asked for approval and has been disapproved I would suggest that the metropolitan area, inasmuch as it is the one that is so involved, discuss this en masse first and present it at some future time.

SPEAKER ANDRESEN Do you wish to make an amendment?

DR. FISCHL Yes I so amend.

SPEAKER ANDRESEN You amend what?

DR. FISCHL I would like to amend this resolution that the metropolitan area, inasmuch as it is the area involved in this particular resolution, study this, and that it be referred to the Coordinating Council of the metropolitan area first for study

SPEAKER ANDRESEN We cannot refer it to the Coordinating Council That is not an official body

DR. FISCHL I would suggest this—I don t know whom to refer it to—that we defeat the resolution, but inasmuch as the metropolitan area is the one involved, and we are going to have 3 000 physicians who may or may not adhere to this resolution I think it is inadvisable for us to pass this resolution and then decide whether or not we are going to issue punitive efforts on those men in the metropolitan area who will not abide by our resolution

SPEAKER ANDRESEN Then you oppose the motion, or are you making an amendment?

DR. FISCHL I oppose the motion

DR. HAROLD B DAVIDSON *New York* There is nobody more than I, nor any county more than New York, which would have enjoyed the backing of the State Society in handling this problem. However, for the same reasons that the previous speaker just mentioned, I believe that this is one of those purely local situations that should be solved at the county level. I therefore, object to the passage of this resolution.

DR. THOMAS M D ANGELO *Queens* First let me say that I did bring in this resolution as an individual. However in so doing I just brought in a resolution that had been passed by the Queens County Medical Society and it stands on its books since 1945

The reason really why I bring this resolution in is so that the matter cannot be solved on a county level. At the present time it may be the problem of the metropolitan area, but within a year or two it is going to be the problem of the upstate area.

We are confronted with a very very peculiar situation Take the New York City area. Here are five counties in the City of New York two counties have specifically disapproved a certain voluntary insurance plan, and two or three counties have taken no action on it The result is that the doctors in the metropolitan area don t know what to do In two counties they have been asked not to join in three counties no action has been taken It is really an anomalous situation. Here we are one city with *different actions being taken in different portions of the city*

Upstate you are going to have that problem pretty soon You are going to have an insurance company start business and the insurance company does not confine itself to one county but spreads over several

We would like the Medical Society of the State of New York just to go on record advising that its members do not become participating physicians in any plan that has not been approved by the Medical Society of the State of New York There is no punitive action involved You cannot have any punitive action here unless the plan is acting unethically Only then can you have a punitive action This is so that all of the doctors are advised not to become physicians in plans that have not our approval It becomes state-wide so that when any physician wants to join a plan all he has to determine is whether it has the approval of the Medical Society of the State of New York yes or no and he can guide himself accordingly This is a very necessary thing

DR. LEO F SCHIFF, *Clinton.* I wish to second what Dr D Angelo has said, and in order to make the motion more effective if passed, I wish to add an amendment which I hope Dr D'Angelo will accept, that the board, or committee or whatever it is that has charge of the prepayment plans—we have such a committee and I cannot think of its name—shall be directed to notify all component medical societies of the action taken. That is simply so we won t wait for the members to read of it in the JOURNAL.

DR. D ANGELO I will second that.

DR. ROONEY Why not have the Secretary of the Society do it?

DR. SCHIFF All right, change it to the Secretary

DR. D ANGELO Right.

DR. ROONEY Not the committee.

DR. SCHIFF Right.

SPEAKER ANDRESEN Will you accept that as an amendment?

DR. FLOOD Yes I will accept that as an amendment.

SPEAKER ANDRESEN That will save us some time

DR. BENJAMIN F GLASSER, *Queens* I think Dr D'Angelo has pointed out very nicely and briefly how this question cannot be settled on a State-wide basis As a matter of fact, the field is new and the whole situation is in such flux, that even in the City of New York, as he has pointed out two counties have acted one way and three counties have taken no action They don t agree Now place yourself in the position of putting the whole thing before the State You will never come to any conclusion if you adopt that principle and any plan that is proposed will of necessity be outside of the practice of organized medicine, and before we know it the members will be in the plan outside of organized medicine I am against the resolution.

SPEAKER ANDRESEN Is there any other discussion?

DR HARRY ARANOW, *Councilor* It still has to be a local thing because, after all, it will have to be decided by the organization in its own district The State Society cannot tell whether or not an organization is fit for the district There are some of these insurance companies who are not approved who may be doing the same thing we are doing, trying to prevent socialized medicine, and I don't think we ought to come to any conclusion and force it down the throat of the individual county I would refer it back to the county

SPEAKER ANDRESEN As I understand it, there is no forcing of anything down anybody's throat It is merely a recommendation to the members

DR D'ANGELO May I have the privilege of speaking once more? This is a very important problem No one is forcing a plan down anyone's throat If a plan can meet the principles laid down by the Medical Society of the State of New York, it can be approved by the Medical Society of the State of New York That is all we ask There are certain principles that have been adopted, and it just so happens a number of plans have not met those principles, yet different portions of the city or even different portions of the State may take different actions on a local level, but these plans transcend being on a local level, they go across counties, and it is not fair for one county to take no action while another county disapproves If a plan is worthy, and meets the requirements of the State of New York, it should come to the State Society and say, "Here is my plan I meet your requirements Am I approved?"

There were calls for the question

The motion was put whether to call the question, and it was carried, thereupon the amendment was put to a vote and was carried, after which the motion as amended was put to a vote, and was carried

DR FLOOD Now I move to adopt the report of the Reference Committee, which was concurred in by all the members, as a whole, as amended

DR THOMAS M D ANGELO *Queens* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

Section 168 (*See 32, 33*)

Report of Reference Committee on Miscellaneous Business A Blood Banks

DR FREDERICK W WILLIAMS, *Bronx* Your Reference Committee had before it for consideration two resolutions, one concerning blood donor service and one concerning blood banks The first resolution introduced by Westchester County

"WHEREAS, the National Red Cross has undertaken the establishment of a nation-wide Blood Donor Service program, the basic philosophy of which is to provide free blood for all, and which provides in some areas not only for donor service but also for collecting, processing, and distributing blood from a centralized bank, and

"WHEREAS, free service for all economic levels of the population is not compatible with established patterns of American life, and

"WHEREAS, a centralized blood bank service under the Red Cross may tend to destroy existing blood banks in the hospitals, and

"WHEREAS, all professional and technical phases of a blood bank program should be under the control and supervision of the physicians of the community, and

"WHEREAS, a permissive program adapted to meet local needs has been approved in Westchester County in full cooperation with the Westchester Chapter of the American Red Cross, now therefore be it

"*Resolved*, that the New York State Medical Society urge county societies to consider the establishment of a Red Cross Blood Donor Service Program similar to that proposed for Westchester which provides

"1 Red Cross Blood Donor Service,

"2 Free Red Cross blood for the medically indigent who are unable to provide replacement,

"3 The continuation of existing hospital blood banks and encouraging the establishment of banks in other hospitals,

"4 Implementation and supplementation of the existing blood bank services,

"5 All professional and technical control and supervision of the donor service program vested in a committee of physicians appointed by the county medical society,

"6 *And general coordination of the program* through a committee representing the Red Cross, the County Hospital Association and the county medical society"

The second resolution introduced by Dr Harry Aranow in behalf of the Council

"WHEREAS, transfusion has become a very important, essential, and life-saving measure in the practice of medicine, and

"WHEREAS, there has been a feeling in the medical profession that the control and collection of blood and blood elements is gradually being taken out of the hands of the medical profession, and

"WHEREAS, there has been an organization formed in the state of Texas called the American Association of Blood Banks, and the purposes of of this organization being

1 To promote and foster the exchange of ideas and materials and the dissemination of information to blood banking and its technical methodology of education, publicity, and research,

2 To foster and plan for cooperation in times of disaster,

3 To function as a clearing house on questions relating to the training of personnel common to such institutions,

4 To keep currently aware of and encourage high standards of service,

5 And to promote and foster and aid and encourage the extension of similar services throughout the United States and its territories, therefore be it

"*Resolved*, that the House of Delegates of the Medical Society of the State of New York are in favor of the purposes of this organization"

Your Reference Committee report in regard to these two resolutions considered together as follows

Your Reference Committee, after deliberation and conference, in due consideration of the importance of the establishment of blood banks and provision for blood donor service both in relation to private practice and civilian medicine, and also in the light of a possibility of a sudden widespread emergency, feels that these are of utmost importance to the profession in this State and the country

Therefore, your Reference Committee recom-

mends that the Medical Society of the State of New York establish a special Committee on Blood Banks of the Council Committee on Public Health to supervise and coordinate the nonprofit blood banks throughout the State This Committee should encourage advise, and assist in the establishment of blood banks on a local county or similar decentralized subdivision basis This Committee should see that these blood banks are so constituted and organized that cooperative effort could immediately be carried out in case of emergency The Reference Committee suggests that the Society approve the principles of the American Association of Blood Banks to have ultimately blood banks of the State possibly become associated in this group

Furthermore the Reference Committee recommends that this special committee use as an example the good cooperative plan proposed and agreed upon by both the Red Cross and Westchester County Society and in the process of being established in Westchester County In this plan prominent features are that the medical profession operates the blood banks and supervises them Under this plan the Red Cross cooperates in the obtaining of blood donors and transportation of donors and blood The Red Cross also may be permitted to support the service with financial aid for equipment and nontechnical assistance

Your Reference Committee feels that this problem is of such importance that this should be a special committee to the Society not necessarily just of the Council

DR. JAMES F ROONEY, *Trustee* I second it.

SPEAKER ANDRESEN The recommendation of the Reference Committee which has been moved and seconded is up for discussion Is there any discussion?

DR. SCOTT LORD SMITH *Dutchess* I thoroughly approve of this whole report of the Committee, but I want to call to your attention—and I think we ought to consider it—that back of this whole matter is a certain tendency of the Red Cross to make of itself a national public uplift organization and that in smaller communities, like mine up in Dutchess County there is going to be very strong pressure from the Red Cross to get themselves in control of the situation because of the relative facility with which they can obtain donors

Then the other side we should consider is the emergency for which we must be prepared I do think that we have got to be very careful in our control of the activities into which the Red Cross enters. However there is another side to it which is we have got to have all of the aid we can possibly get from the Red Cross in carrying out this program. It is a very delicate, diplomatic situation to make the adjustment

SPEAKER ANDRESEN Is there any further discussion?

DR. WILLIAMS Your Reference Committee was fully aware of these conditions that Dr Scott Lord Smith has called to the attention of the House We felt that the re-establishment really of this Blood Bank Committee as a subcommittee of Dr Mitchell s Public Health Committee could take care of the details with the suggestions that we recommended

We are all well aware especially in New York, that the Red Cross would like to take over the blood banks every blood bank in America. We are all aware that the doctors should operate the blood banks and the Reference Committee feels its report has covered this quite thoroughly

I once again recommend the adoption of the Reference Committee s report

DR THOMAS F MCCARTHY *Bronx.* May I offer an amendment, if the Chair will accept it that this Committee negotiate with the Red Cross so as to revise any previous agreements which do not conform with this recommendation?

SPEAKER ANDRESEN Isn t that covered by the report?

DR. MCCARTHY But there are previous agreements made with the Red Cross before this was brought up which do not conform.

DR. WILLIAMS Dr McCarthy is quite right In the City of New York there have been some sort of agreements by which the Red Cross proceeded to jump right in and set up the blood banks regardless of whether the doctors are running them or not We feel that this Committee would undoubtedly include the revision of any already established blood collection services set up by the Red Cross We have set these criteria down for the Committee and I am sure every member of the Reference Committee would be glad to accept that amendment You don t need to vote on it

DR. THOMAS M. D ANGELO *Queens* As a matter of fact, the Red Cross program in New York City is only going on for one year and at the end of the year will be completely evaluated so that our criteria at that time can be brought to their attention very well then

DR. HAROLD B DAVIDSON *New York* I thoroughly approve of the Committee s report, and have only one comment It speaks of free blood With the Red Cross there is no such thing as free blood

DR. WILLIAMS That word free' will be deleted

The question was called and the motion was put to a vote and was unanimously carried

Section 169 (*See 93*)

Report of Reference Committee on Miscellaneous Business A Automobile Agency

DR. FREDERICK W WILLIAMS, *Bronx* Your Reference Committee also received a resolution

WHEREAS It is becoming increasingly difficult for physicians to purchase automobiles and

WHEREAS the automobile is a part of the doctor s equipment in his practice of medicine therefore be it

Resolved that the Council of the Medical Society of the State of New York be instructed to explore the possibilities of establishing an agency for the purchase of automobiles by doctors.

Your Reference Committee recommends the disapproval of this resolution and I so move

DR STEPHEN R. MONTEITH *Rockland* I second the motion

There being no discussion the motion was put to a vote and was unanimously carried

DR. WILLIAMS Now I move the approval of the report as a whole as amended

DR THOMAS F MCCARTHY *Bronx* I second the motion

There being no discussion, the motion was put to a vote and was unanimously carried

SPEAKER ANDRESEN Thank you Dr Williams!

Section 170 (*See 69*)

Report of Reference Committee on Miscellaneous Business B Draft of Physicians

DR. WILLIAM B RAWLS, *New York* I have only one more resolution here, introduced by Dr B M Bernstein of Kings

WHEREAS, the medical profession always has taken and always will unselfishly take its part in any national emergency and

"WHEREAS, it would appear that the passage of draft legislation by the Congress is imminent, and

"WHEREAS, indications are that an attempt will be made to adopt a different age differential for physicians from that to be advised for the rest of the available population, and

"WHEREAS, it would appear that an adequate pool of physicians already exists from amongst those educated under government student programs during the last war and as yet not called for duty, and from those deferred during the last war for a variety of reasons, and from amongst those now completing or who will complete internships during the next two years, and from those who will volunteer their services, even though not of draft age, therefore be it

"Resolved, that such a differential in age of those eligible for draft would be discriminatory, unnecessary, undemocratic, and contrary to the principles of our constitution, and be it further

"Resolved, that the proper committees of the House, Senate, and the presiding officers of those bodies and the Secretary of National Defense and the Secretaries of the Army, Navy and Public Health Service, and the President of the United States be so advised by the endorsement of this resolution at this session of the House of Delegates, and be it further

"Resolved, that the chairman of the National Security Resources Board and the Secretary of National Defense be urged to sanction the creation of a Civilian Medical Board to aid in obtaining the necessary medical personnel which would be required under a selective service draft act, and be it further

"Resolved, that the secretary be instructed to transmit these resolutions to the above-named authorities without delay"

Your Reference Committee considered this, and we felt that the wording should be changed We added one "whereas" to bring out some of the resolved that we felt was necessary

"WHEREAS, in World War II procurement and assignment for physicians, dentists, and veterinarians did an excellent job, and it was not necessary to draft any of these groups, much to the credit of these groups, although the proportion entering service was greater than any other group, therefore, be it

"Resolved, that the Secretary for the national defense be urged to set up a board similar to the procurement and assignment board of World War II to aid in obtaining the necessary medical personnel, and be it further

"Resolved, that this House of Delegates express its request that whatever boards are formed to secure medical personnel for the armed services exhaust all possibilities of obtaining them from the groups above named and from those of draft age and from volunteers, before any outside these groups are asked to serve, and be it further

"Resolved, that a copy of this resolution be sent to whatever boards are set up to obtain medical personnel for the armed services, and be it further

"Resolved, that the delegates to the American Medical Association from the Medical Society of the State of New York be instructed to introduce this resolution at the annual meeting of the American Medical Association in 1948"

I move its adoption as thus reworded

"WHEREAS, the medical profession always has been, and always will, unselfishly, take its part in any national emergency, and

"WHEREAS, it would appear that the passage of draft legislation by the Congress is imminent, and

"WHEREAS, indications are that an attempt will be made to adopt a different age differential for physicians from that to be advised for the rest of the available population, and

"WHEREAS, it would appear that an adequate pool of physicians already exists from amongst those educated under government student programs during the last war and as yet not called for duty, and from amongst those now completing or who will complete internships during the next two years, and from those who will volunteer their services, even though not of draft age, and

"WHEREAS, in World War II procurement and assignment for physicians, dentists, and veterinarians did an excellent job, and it was not necessary to draft any of these groups, much to the credit of these groups, although the proportion entering service was greater than any other groups, therefore be it

"Resolved, that the Secretary for National Defense be urged to set up a board similar to the procurement and assignment board of World War II to aid in obtaining the necessary medical personnel, and be it further

"Resolved, that this House of Delegates express its request that whatever boards are formed to secure medical personnel for the armed services exhaust all possibilities of obtaining them from the groups name above and from those of draft age and from volunteers before any outside these groups are asked to serve, and be it further

"Resolved, that a copy of this resolution be sent to whatever boards are set up to obtain medical personnel for the armed services, and be it further

"Resolved, that the delegates to the American Medical Association from the Medical Society of the State of New York be instructed to introduce this resolution at the annual meeting of the American Medical Association in 1948"

DR FREDERICK W WILLIAMS, *Bronx* I second the motion

SPEAKER ANDRESEN Any discussion?

DR BENJAMIN M BERNSTEIN The *Journal of the American Medical Association*, Volume 137, No 2, May 8, 1948 issue, pages 162 and 163, referring to the action of the Council on National Emergency Medical Service says

> In making special provision for the drafting of physicians up to the age of 45 years this bill in the opinion of the Council proposes a type of legislation that is on its face highly discriminatory and coercive if not actually unconstitutional

And then it goes on further to say

> 'It is therefore the considered opinion of the Council on National Emergency Medical Service that immediate action should be taken committing the American Medical Association in opposition

(etc)

There is also an editorial in the very same issue where the Council urges each State and local medical association to exert every effort and influence at its command within the next several days to assure the establishment of a civilian medical board at the highest level of government, such as a functioning agency of the National Security Resources Board, to be responsible for the policies and programs re-

quired for the medical health and sanitary services of the civilian population, of industry, of agriculture, and of the armed forces in time of emergency of national mobilization

We might duck the idea of the draft act being discriminatory, but discriminatory it would be if passed in the form as proposed by the Congress at the present time We might duck it by saying we will be nice boys and do what we did before, but apparently the Council wishes the possible discriminatory action to be avoided by such action of ours.

Secondly to ask the delegates to the American Medical Association to present similar resolutions before that body will not accomplish very much because Congress will be out of Washington long before that action can occur

I believe the discriminatory paragraph might well be permitted to remain

DR. RAWLS It says that these boards be so informed We can change that to whatever authorities are deemed necessary

DR. HARRY ARANOW, *Councilor* Our Senators and Representatives could be informed.

DR RAWLS I accept that

DR ROONEY I think it should be definitely provided that the Secretary be directed to send the information of the passage of these resolutions, quoting the essential parts thereof to all persons concerned in the enactment of this legislation as the official action of the Medical Society of the State of New York and not merely the Council

DR. J STANLEY KENNEY *Councilor* I second that amendment

SPEAKER ANDRESEN Will you accept that?

DR. RAWLS Yes. It is practically in here except it does not say all authorities.

The question was called, and the motion as amended was put to a vote and was unanimously carried

SPEAKER ANDRESEN I don t believe there are any more reference committees to report Are there any?

There was no response

Section 171

Notice to Amend Article XI of the Constitution and Bylaws of the Medical Society of the State of New York

SPEAKER ANDRESEN Dr Monteith would like permission to introduce a constitutional amendment. He requires a two-thirds vote for permission to introduce this

The request was put to a hand vote and there was no negative vote cast.

DR. STEPHEN R. MONTEITH, *Rockland* Notice to amend Article XI of the Constitution and Bylaws of the Medical Society of the State of New York covering the setup of the district branches

WHEREAS, it appears that geographical redistribution of the District Branches would be advantageous with the possible creation of a Ninth District Branch therefore be it

'Resolved that Article XI of the Constitution and Bylaws of the Medical Society of the State of New York be hereby amended to create a Ninth District Branch and by such other redistribution as appears advantageous to develop the organizational activities of the District Branches

SPEAKER ANDRESEN That is merely a notice to go on file

Section 172

Reappointment of Planning Committee for Medical Policies

DR J STANLEY KENNEY *Councilor* Under the setup of the Planning Committee for Medical Policies, it is a special committee of the House of Delegates, and it is appointed on a yearly basis Unfortunately there was no time for discussion of a number of important problems that are before the Committee, particularly group practice, which is being studied by the Committee, in collaboration with a similar committee in the American Medical Association also this question of the inclusion of hospitals and medical schools into the practice of medicine The gentlemen on this Committee are well informed in the study and it is a continuing study Therefore I would make the recommendation that the House continue this Committee and have the Speaker appoint its personnel as prescribed.

DR. THOMAS M D ANGELO *Queens* I second it

There being no discussion, the motion was put to a vote and was unanimously carried

Section 173

1949 Meeting of House of Delegates

SPEAKER ANDRESEN We have an invitation here from the delegates from Erie County to have the next State meeting in 1949 in Buffalo

DR JAMES F ROONEY *Trustee* That matter I think under the Constitution and Bylaws has to be referred to the Council

SPEAKER ANDRESEN Yes

DR ROONEY The House may make its recommendation but it must be essentially referred to the Council for their action

SPEAKER ANDRESEN Will you make the recommendation?

DR. ROONEY I will make the recommendation that we accept the invitation of Erie County and that that be communicated to the Council to set the time of the meeting

DR. JOHN B D ALBORA *District Delegate* I second that motion.

There being no discussion the motion was put to a vote and was unanimously carried

SPEAKER ANDRESEN I think that completes our business

Section 174 (See 14 137 140)

Special Assessment for War Memorial

DR. JAMES F ROONEY *Trustee* You have voted to establish the War Memorial. You have voted the plan, and I take it that some of you fancy that that carried with it the special assessment to carry it out It did not because that was a separate matter and for that purpose I now move you sir that a special assessment of $12 for each member of the Society be levied and payable within the current year as of this year's dues, the dues and assessment for 1948 payable to the Treasurer of the Society for the purpose of establishing a war memorial fund in conformity with the resolved made in the resolution establishing such fund That means that the fund will be in the hands of the Treasurer of the State Society under the charge of the Board of Trustees and expended only upon the direct authority of the Council of your Society I make that motion

DR. HAROLD B DAVIDSON *New York* I second it

SPEAKER ANDRESEN I will put this in the form of one motion to grant Dr Rooney the floor and second to adopt his resolution We will act on them both at once. Is there any discussion?

DR LEO F SCHIFF, *Clinton* While I, personally, am in favor of this motion, I still feel that this body is too small a body to take an action that is going to affect 20,000 men It is going to create considerable discussion in some of the county societies, and it should be disposed of by a referendum I am not going to make any motion to do anything about it I simply speak of that fact Thank you for the privilege If somebody else is interested enough, he can do it

DR FREDERICK W WETHERELL, *Onondaga* How much would it cost to conduct a referendum of each individual member of the Medical Society of the State of New York?

DR ROONEY May I have the answer to that question?

DR SCHIFF I cannot answer that

DR ROONEY We have had I think, within the period of my being in the House of Delegates for some thirty-odd years, one referendum to the best of my knowledge From my best recollection that referendum cost the Society something in the neighborhood of $5,000, and the responses to that referendum were from less than 10 per cent of the membership

I feel that the referendum is in the Constitution, while we are meeting matters of emergency, but, gentlemen you are sent here as delegates from your own county societies This matter has been under discussion for three years Every member of this State Society must be familiar with it It has been published repeatedly in the JOURNAL The question has been discussed for three years If we are going to gain anything by referendum, very well, I have no objection to the expense, gentlemen, but you will get approximately the same percentage of response to a referendum vote for 21,000 members Don't forget also that to carry on a summary of the tally of that vote will necessitate our employing additional employes in our headquarters to do it That has to be tallied, summarized, and then reported—a postponement of another year

Gentlemen, I leave the decision to you It is your decision I take it that Dr Schiff, as he said, is not proposing to make a motion that a referendum be had I feel we had better dispose of this thing definitely one way or the other now

DR HARRY ARANOW, *Councilor* I have been in this House for a long time We have made decisions of much more importance to the members than $12 We have made very important decisions That is our duty here That is what we are sent here to do, to decide for the 20,000 men that cannot possibly be here

DR HOMER J KNICKERBOCKER, *Ontario* We are the representatives of our county societies What we say goes If you get less than 20 per cent of response to your legislative program, what do you expect from this, another flop?

DR CHARLES GULLO, *Livingston* Dr Rooney, I believe you said you would expect to collect the fee for the balance of the year, correct?

DR ROONEY Yes, that it would be made this year, if the House so decided If I may add, Mr Speaker, through you, that the assessment will be levied for the year 1948

DR GULLO Why I ask you that question is because, from the discussion that preceded this at the time it was introduced, the implication was that in the event that the members of the Society do not pay their fee they are automatically not members of the County and State Societies, but all of the members of the Society as of now have paid their dues, so they are members May I suggest that the collection of this money be extended over a period of twelve months so that it will carry it on into next year You cannot throw out a member that is already a member

DR ROONEY May I answer, Mr Speaker?

SPEAKER ANDRESEN Yes

DR ROONEY I understand that perfectly, Dr Gullo I move that the assessment be levied as of the year 1948 Do you understand now? I realize that your dues and annual assessments would have to be paid before June 30 Am I correct in that? There can be no suspension of membership on an assessment levied now until failure has been made to make that payment upon the next year's dues Is that clear? So that there can be no suspension for failure to pay this assessment, if it is levied, before 1949 We hope, however, that there may be enough men, knowing that the assessment has been made, who will pay so we can begin to take care of three of these children who are now within the age limit when they should be provided for

DR REULING State assessments are collected by the counties and remitted through the counties to the State I want to raise the question—and I think it should be in the motion—how this assessment shall be billed, whether it shall be billed directly from the State office by the treasurer or whether it should be billed through the counties I believe the motion as previously stated by Dr Rooney could probably be restated saying how the money was to be collected and when a man would be considered in arrears if the special assessment is not paid

Might I ask, Mr Speaker, Dr Rooney to reword his motion so that it covers the point?

DR ROONEY I will answer, Mr Speaker, if I may, though I don't think there is any necessity of my answering the question The money can be collected in only one way, and that is specified in the Bylaws and Constitution It will be collected just as dues are collected, through the county societies, and will be transmitted by the treasurers of the county societies to the treasurer of the State Society There is no other provision, and we ought not to constitute a new method It should be assessed against the county society, the secretary to inform the county societies that a special assessment is levied against every member of the Medical Society of the State of New York in the ordinary form and manner that your dues are assessed against you, and have it collected in the same manner in so far as possible during the current year

Now that is a pious wish There is no compulsion about it, and no penalty can attach unless the man fails to pay that assessment outside of the constitutional limits in 1949

DR EZRA A WOLFF, *Queens* I should like to ask a question, Mr Speaker Which members would be liable to this assessment? I am thinking particularly of members coming into the Society within the next year as to when would they be liable for this assessment?

SPEAKER ANDRESEN Can you answer that, Dr Rooney?

DR ROONEY I think the average accretion of membership of this Society now is running approximately 800 a year Am I correct about that, Mr Secretary?

SECRETARY ANDERTON Approximately, yes, sir

DR ROONEY What difference does it make? Any county society can determine for itself just as it determines its dues If a man comes in during such a

period he does not pay dues for that period I know if a man in Albany County becomes a member of the county society in November he is not required to pay county society dues for that period of time until the succeeding year, however he becomes a member of the State Society and becomes responsible for the payment of dues for the current year in which he joins. Am I correct in that Mr Secretary? The county society becomes liable for that man's State dues for the year in which he joins the Society?

SECRETARY ANDERTON Up until the 31st of October

DR. ROONEY If he comes in after the 31st of October he is responsible neither for his Medical Society dues nor will he be responsible for the assessment. The same proviso will hold for this assessment as holds for the dues for the year 1949 We hope however that if the notice that the special assessment is levied is sent out that we may accumulate sufficient money to start the operation of this plan as promptly as may be.

DR. JOHN L O'BRIEN *Bronx* I was on this Reference Committee I don t know whether the chairman is here or not but we expressed in our approval of the report confidence in the men who formed this report and also confidence in the ones who are to finish the formation of this War Memorial, work out the details of it If I remember correctly one of the items contained in our recommendation was that the assessment should be upped to a maximum of $12 We did not state that there should be a specific amount at this time determined, simply because we felt the details of this project were not completed We had an estimated figure from the committee If you take these 58 children under the third plan, and you give them eight years of education at $600 a year you will need $278 400 I think those figures are correct If you collect $12 a year from approximately 21 000 members you will have $252,000 in the fund This will cover all of the possibilities I am sure. With the figure I am giving you, you are paying out the maximum amount that you can pay out. We felt that we had to give some leeway to the men who are going to complete the project in its detail, and they would determine the amount of the assessment that was to be made We could not determine that in an hour and a half at a table after they had probably spent weeks getting this estimate figure of $242 000-odd or whatever it might be.

SPEAKER ANDRESEN That is why we have the motion.

DR. ROONEY May I answer that? I think I can settle that in a minute There was in the recommendation of the committee and that the Council will be authorized to take care of additional sums in cases of need. That is the reason why that $12 was fixed instead of the $11 25 to take care of the provision for some of these children and families who become destitute if the need arises That is all gentlemen

DR. O'BRIEN Your committee in its report left the determination of that figure up to the future

DR. ELTON R DICKSON *Broome* I would like to ask Dr Rooney if he would have any objection to splitting that $12 into two assessments

SPEAKER ANDRESEN It cannot be done We can only do it for one year

DR. ROONEY I spoke about that this morning

SPEAKER ANDRESEN That was explained this morning

There being no further discussion the motion was put to a vote and was carried

Section 176

Vote of Thanks to Exhibitors and Hotel Management

DR LOUIS H BAUER, *President* Mr Speaker before we adjourn I would like to make a motion We, this morning extended our thanks to the various committees, etc. who handled the convention but I would like to move that we extend our thanks to the scientific exhibitors who have gone to considerable time and trouble in preparing these exhibits and to the exhibitors who after all have made this meeting possible, and to the management of the hotel

The motion was seconded by several and as there was no discussion it was put to a vote and was unanimously carried

Section 176

Vote of Thanks to the Speaker

DR. LOUIS H BAUER, *President* This may be horning in on your territory Dr Rooney but I want to move a standing vote of the House to the Speaker for his management of the meeting

DR. ROONEY You did it I knew you would I think I can speak for the House when I say with all due modesty that they admire and respect you for your impartiality and your keenness of decision and your personality

The delegates arose and applauded

SPEAKER ANDRESEN I thank you for this expression. I thank the members also for their patience during this long ordeal and for their generous and earnest consideration of all matters that have been presented here and for their faithful attendance to this late hour

Before adjourning this convention I wish to say that the reason we have had such a smooth running meeting is that we have had such an efficient staff and we have had such superlative help from our reference committees

I thank the Vice-Speaker, the Secretary, Miss Dougherty Mrs Grimm and the other members of their staff for their unfailing and enthusiastic cooperation and the reference committees for their wholehearted support.

I also wish to compliment our sergeants-at-arms for their efficient and long lasting service yesterday afternoon

If there is no further business I have one more announcement The Council will meet at 2 30 this afternoon in Room 111 the Trustees are going to meet in the back of the room for a few minutes now and they can decide when they want to meet again

Section 177

Notice of Intention Generally to Change Constitution and Bylaws

DR JAMES F ROONEY *Trustee* This is notice that I propose to change the Constitution and By laws generally at the next session of the House.

SPEAKER ANDRESEN That has been noted

Is there any further business to come before the House of Delegates?

There was no response

SPEAKER ANDRESEN If not the meeting stand adjourned *sine die*

The meeting adjourned at 1 15 P M

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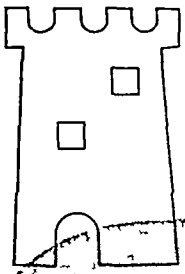
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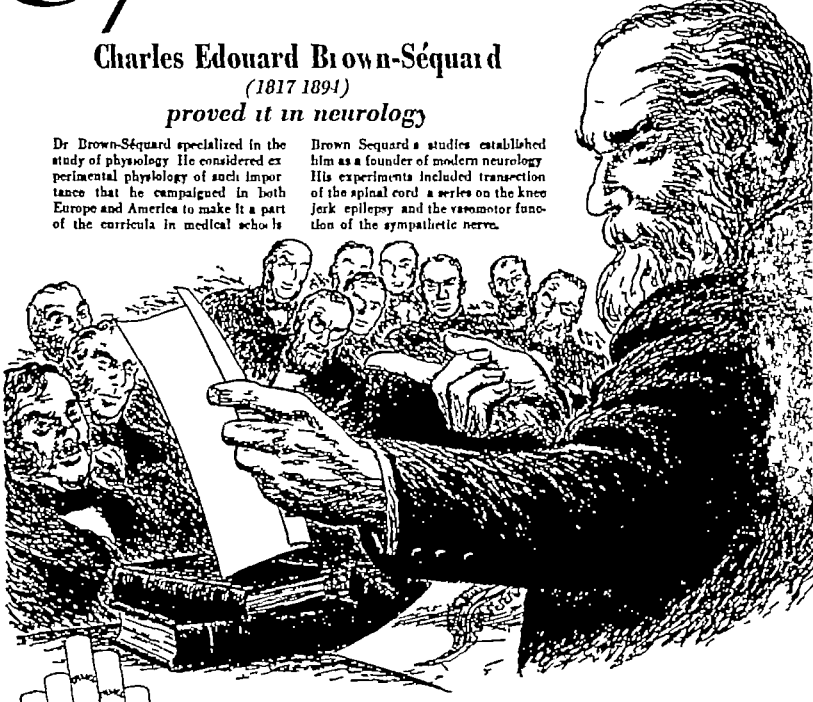
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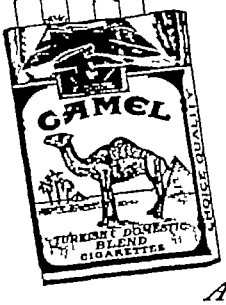
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Survey of Ragweed Pollination in the New York Metropolitan District in 1947, *Eugene H Walzer, M D , Bernard B Siegel, M D , Robert A Chait, M D* , and *Matthew Walzer, M D* 2019

Streptomycin in Dermatology Its Value and Limitations, *Frank C Combes, M D , Orlando Canizares, M D , Harry Shatin, M D* , and *Carl Kaufman, M D* 2024

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(Continued on page 1988)

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BIBLIOGRAPHY

1 Couch J F Krewson C F Naghski J and Copley, M J : Bureau of Agriculture and Industrial Chemistry U S Dept of Agriculture, A I C 115 (1946)

2 Griffith J Q Jr Couch J F and Lindauer M A : Proc Soc. Biol and Med , 55:228 (1944)

3 Zfass H. S : Virg Med Monthly 74:56 (1947)

4 Shanne R H Griffith J Q, Jr and LaMotte W , Jr : Scientific Exhibit Medical Society of State of Penna Phila Oct 7 10 (1946)

5 Strean L P : Dental Items of Interest 70:153 (1948)

6 U S Dept of Agriculture Agricultural Research Administration Washington Letter January 24 (1946)

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Robert S Hotchkiss, *Secretary*	New York
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Officers of the Session on the History of Medicine and Session on Physical Medicine will be announced at a later date

DUODENAL-GASTRIC ULCER

Treatment Antacid Rx·—CA-MA-SIL Powder, in ½ glass water (preferably hot)
2 tspfls *before* and after meals and upon retiring

Clinical observations of the merits of CA-MA-SIL Antacid Powder are convincing in the treatment of excess gastric hyperacidity associated with **DUODENAL and GASTRIC ULCER.** Successful management with CA-MA-SIL assures the patient of 3 nearly normal meals, prompt relief, and aids rapid healing The longer neutralizing period makes it especially effective in Duodenal Ulcer Therapy *

PRESCRIBED BY PHYSICIANS EVERYWHERE

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* ALSO UNEXCELLED FOR NAUSEA OF PREGNANCY

* DOES NOT INDUCE ANOREXIA-CONTAINS NO SODA OR ALUMINUM HYDROXIDE

Formula New Magnesium Silicate Special (not trisilicate) Calcium Carbonate Diammonium Hydrogen Phosphate
Samples Available

In a class by itself





Sodium sulfacetimide is the *only* sulfonamide which can be dissolved to the extremely high *concentration of 30% at physiologic pH 7 4* It is *more bacteriostatic* than any other sulfonamide used locally more deeply penetrating into ocular tissues, and yet virtually nonirritating

SODIUM SULFACETIMIDE SOLUTION 30%

(SODIUM SULAMYD)

for eye infections

For more certain *prevention of infection* following all types of corneal abrasions lacerations and burns, or after removal of embedded conjunctival and corneal foreign bodies, one drop of SODIUM SULFACETIMIDE SOLUTION 30% should be instilled every two hours for at least one day after injury

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SODIUM SULFACETIMIDE SOLUTION 30% (Sodium SULAMYD®) is available in 15 cc. amber eye-dropper bottles. SODIUM SULFACETIMIDE OPHTHALMIC OINTMENT 10% (Sodium SULAMYD) in ⅛ oz. tubes. Box of 12 tubes.

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FOR EFFECTIVELY REGULATING BOWEL ACTION

KONDREMUL

An Emulsion of Mineral Oil and Irish Moss

3 Types

KONDREMUL Plain (containing 55% mineral oil)

KONDREMUL with non-bitter Extract of Cascara (4 42 Gm per 100 cc)

KONDREMUL with Phenolphthalein— 13 Gm (2 2 grs) phenolphthalein per tablespoonful

Kondremul is effective in both atonic and spastic constipation Its smooth yet reliable action is accomplished without griping, and it is free from roughage

Canadian Distributors Charles E Frosst & Co , Box 247, Montreal, Quebec

THE E. L. PATCH COMPANY

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INDEX TO ADVERTISERS

American Pharmaceutical Company	1984
Ames Company, Inc	1987
The Arlington Chemical Company	1992
Ayerst, McKenna & Harrison Limited	1991
Dr Barnes Sanitarium	2089
Beech-Nut Packing Company	1997
Boast & Haggerty	2079
Borcherdt Malt Extract Company	2079
George A Breon & Company	2082
Brewer & Company Inc	2073
Brigham Hall Hospital	2091
Brunswick Home	2091
Ca-Ma Sil Company	1994
S H Camp and Company	1998
Carnation Milk Company	2000
G Ceribelli & Co	2079
Ciba Pharmaceutical Products, Inc.	3rd cover
Crane Discount Corporation	2081
The Doho Chemical Corporation	1999
Dome Chemicals Inc	2079
H E Dubin Laboratories Inc	2004
Endo Products Inc.	2012
Falkirk in the Ramapos	2091
Flint Eaton & Co	2086
Fried & Kohler Inc	1983
Halcyon Rest	2091
J E Hanger	2087
Harmon Chemicals, Inc	2081
Holbrook Manor	2091
Holland-Rantos Company, Inc	2080
Homemakers Products Corporation	2009
Interpines	2091
Ives Cameron Company Inc	2084
Lakeside Laboratories, Inc	2013
Eli Lilly and Company	2014
Louden-Knickerbocker Hall, Inc	2089
M & R Dietetic Laboratories, Inc	2088
Mandl School	2087
The Maples, Inc	2089
Massapequa Villa	2091
Mead Johnson & Co	4th cover
Merck & Co , Inc	2005
The Wm S Merrell Company	2nd cover
National Confectioners Association	2006
The National Drug Company	2007
Nepera Chemical Co Inc	2008
Nestle s Milk Products Inc	2083
New York Medical Exchange	2091
Novocol Chemical Mfg Co , Inc	1986
Num Specialty Co	2081
Paine Hall	2087
Parke Davis & Company	2003
The E L Patch Company	1996
Pediforme Shoe Co	2081
Raymer Pharmacal Company	2085
R J Reynolds Tobacco Co	1985
Wm S Rice Inc.	2004
A H Robins Company	2001
Sandoz Chemical Works Inc	1988
Saratoga Springs Authority	2010
Schering Corporation	1995
Julius Schmid Inc	2092
G D Searle & Co	1993
E R. Squibb & Sons	2090
Standard Pharmaceutical Co Inc	2089
The Tarbonis Company	2094
Teca Corporation	1990
Charles B Towns Hospital	2089
Twin Elms	2091
Van Patten Pharmaceutical Co	2081
Varick Pharmacal Co , Inc.	2002
The Wander Company	2075
West Hill	2089
Westwood Pharmacal Corp	2011
Whitbread & Co , Ltd	2087
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Bear this in mind—always Beech-Nut has cooperated closely with doctors and food specialists in the selection and scientific preparation of Beech-Nut Baby Foods from their very beginning. Food flavor and values are retained in high degree. Every step in their processing is checked and rechecked. Meal time is happy time when you give your baby

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ALWAYS PACKED IN GLASS

In the Conservative Treatment of

The Lumbosacral and Lower Lumbar Regions

CAMP SUPPORTS offer advantages

...Give firm support to the low back; the support is easily intensified by re-inforcement with pliable steels or the Camp Spinal Brace

...Afford a more stable pelvis to receive the superincumbent load.

...Allow freedom for contraction of abdominal muscles under the support in instances of increased lumbar curve (fig 1).

...Are removed easily for prescribed exercises and other physical procedures prescribed by physiatrist or physician.



FIGURE 1—Patient—thin type of build with beginning faulty body mechanics The Camp adjustment provides a more stable pelvis, allowing patient to "draw in" the abdominal muscles thus gradually acquiring a gentle lumbar curve

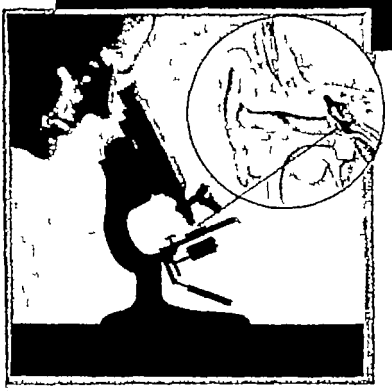
FIGURE 2—Patient—intermediate type of build Strain of lumbosacral joint predisposes to other strains For protection of the joints in the lumbar region from recurrent strain and also as an aid in relieving the pain of acute conditions, Camp lumbosacral supports have proved effective

S. H CAMP AND COMPANY • JACKSON, MICHIGAN

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PIONEERS in Research . . . and Leadership thru the years in combating OTITIS MEDIA



DOHO in realizing the need for a potent, topical, well tolerated ear medication yet mindful that no one formula could be suitable for all conditions devoted every facility and scientific resource to the development and perfection of AURALGAN and OTOSMO-SAN Each has its sphere of usefulness each has been tested and clinically proven in many thousands of cases. *Reprints and sub stantiating data sent on request*

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Auralgan
IN ACUTE OTITIS MEDIA

is a scientifically prepared, completely water free Glycerol (DOHO) having the highest specific gravity obtainable, containing antipyrine and benzocaine which by its potent decongestant, dehydrating and analgesic action provides effective relief of pain and inflammation

O-TOS-MO-SAN
IN CHRONIC SUPPURATIVE OTITIS MEDIA, FURUNCULOSIS AND AURAL DERMATITIS

is not just a mere mixture, but a scientifically potent chemical combination of Sulfathiazole and Urea in AURALGAN Glycerol (DOHO) base which exerts a powerful solvent action on protein matter, liquefies and dissolves exuberant granulation tissue, cleanses and deodorizes, and tends to exhilarate normal tissue healing in the effective control of chronic suppurative otitis media

Literature and samples on request

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Thanks to DOCTOR'S ORDERS



more babies are fed on





Carnation than any other

evaporated milk



YES – and most of the mothers who use Carnation for infant feeding say their formula was prescribed by the doctor or hospital

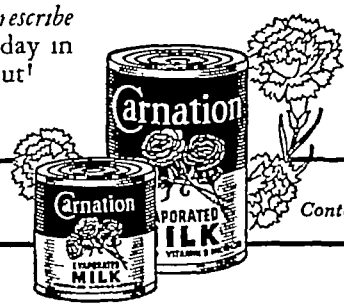
With such wide-spread medical endorsement, it's no wonder more babies are fed on Carnation than on any other brand of evaporated milk —*or any other infant feeding formula of any kind!*

To win and *hold* your professional recommendation, Carnation Milk is processed with *prescription accuracy*" It is evaporated, homogenized, fortified and sterilized under continuous rigid control Repeated tests and vigilant inspection are your guarantee that every can meets Carnation's unsurpassed standard of quality and uniformity

The milk every doctor knows' is one you can confidently *prescribe by name* – day in and year out!



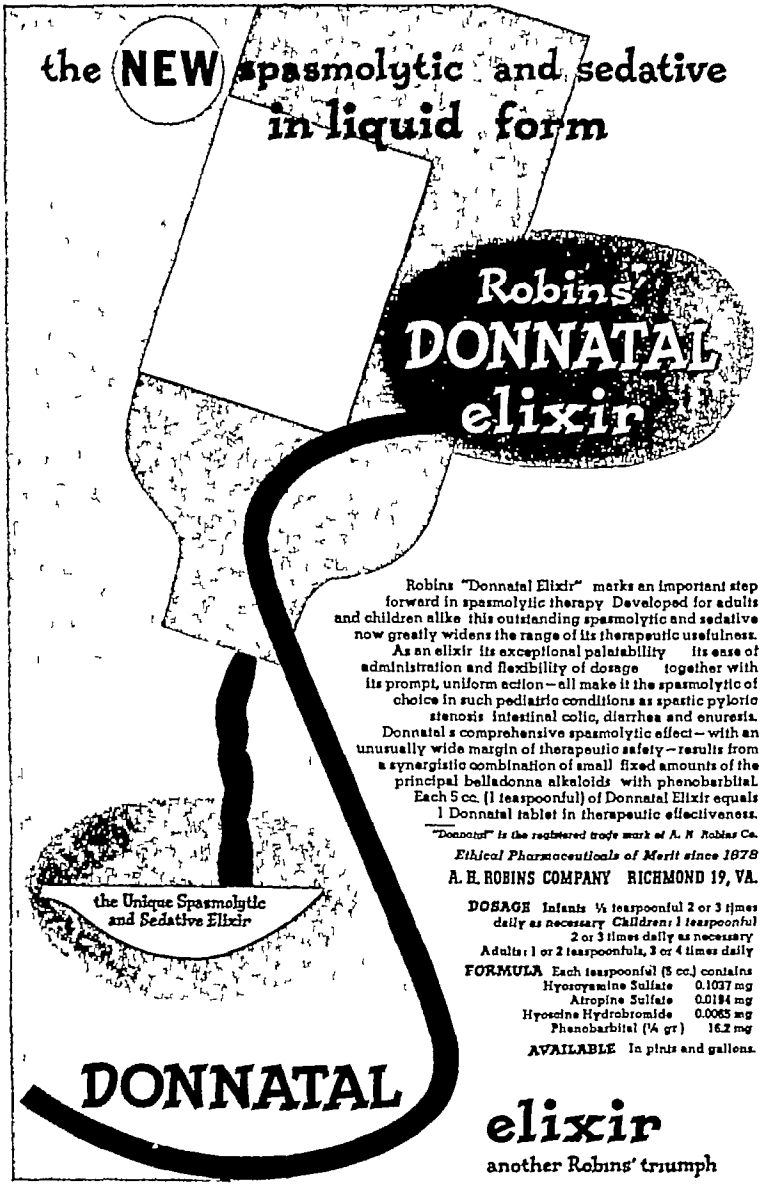
Nation wide surveys indicate that Carnation Milk is more widely used in infant feeding than any other brand of evaporated milk



The Milk Every Doctor Knows

From Contented Cows

the NEW spasmolytic and sedative in liquid form



Robins "Donnatal Elixir" marks an important step forward in spasmolytic therapy. Developed for adults and children alike, this outstanding spasmolytic and sedative now greatly widens the range of its therapeutic usefulness.

As an elixir, its exceptional palatability, its ease of administration and flexibility of dosage, together with its prompt, uniform action—all make it the spasmolytic of choice in such pediatric conditions as spastic pyloric stenosis, intestinal colic, diarrhea and enuresis.

Donnatal's comprehensive spasmolytic effect—with an unusually wide margin of therapeutic safety—results from a synergistic combination of small fixed amounts of the principal belladonna alkaloids with phenobarbital. Each 5 cc. (1 teaspoonful) of Donnatal Elixir equals 1 Donnatal tablet in therapeutic effectiveness.

"Donnatal" is the registered trade mark of A. H. Robins Co.

Ethical Pharmaceuticals of Merit since 1878

A. H. ROBINS COMPANY RICHMOND 19, VA.

DOSAGE Infants ½ teaspoonful 2 or 3 times daily as necessary. *Children:* 1 teaspoonful 2 or 3 times daily as necessary. Adults: 1 or 2 teaspoonfuls, 3 or 4 times daily.

FORMULA Each teaspoonful (5 cc.) contains

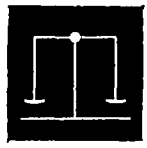
Hyoscyamine Sulfate	0.1037 mg
Atropine Sulfate	0.0194 mg
Hyoscine Hydrobromide	0.0065 mg
Phenobarbital (¼ gr.)	16.2 mg

AVAILABLE In pints and gallons.

elixir

another Robins' triumph

MODERN DIGITALIS THERAPY

reduces dosage  *to milligrams*

. . . disability  *to hours!*

Simplicity of administration with dosage *by weight* and effect *in hours* —together with virtual freedom from locally induced nausea or vomiting —makes Digitaline Nativelle a preparation of choice wherever and whenever digitalis therapy is indicated

In developing the first clinically proven active principle of digitalis purpurea, Digitaline Nativelle has provided the medical profession with a major advance in the treatment of cardiac decompensation Utilizing the active principle, Digitaline Nativelle acts uniformly whether administered by mouth or by vein

Prescribed for these 5 advantages

1 Uniform potency by weight.

2 Identical dosage and effect when given intravenously or by mouth

3 Virtual freedom from gastric upsets and other untoward side effects

4 Absorption and action is rapid uniform, determinable by the clock

5 Active principle enthusiastically accepted by leading cardiologists

SIMPLICITY OF ADMINISTRATION

RAPID DIGITALIZATION *1.2 mg in equally divided doses of 0 6 mg at three hour intervals*

MAINTENANCE *0 1 or 0.2 mg daily depending upon patient's response*

CHANGE-OVER *0 1 or 0.2 mg of Digitaline Nativelle may advantageously replace present maintenance dosage of 0 1 gm or 0.2 gm. of whole leaf*

Supplied through all pharmacies in 0 1 mg pink tablets and 0 2 mg white tablets — in bottles of 40 and 250. In ampules of 0.2 mg (1 cc.) and 0.4 mg (2 cc.)—in packages of 6 or 50 VARICK PHARMACAL CO INC. (Division of E. Fougera & Co Inc.) 75 Varick Street New York, New York.

Digitaline Nativelle

active glycoside of digitalis purpurea

(*digitoxin*)



Nutritive Capsules

provide prenatal and postnatal protection

They contain mineral vitamin factors often poorly represented in patients' diets
Increased requirements during pregnancy and lactation are well recognized

"CALCIUM which is essential for the proper development of bone clotting of blood, and normal neuromuscular action. "[1]

Each *Nutritive Capsule* supplies 725 mg. of anhydrous Dicalcium Phosphate providing calcium and phosphorus in approximately the same physiologic ratio (1.3 to 1) as in blood and in milk.

"PHOSPHORUS which associated with calcium is the formation of bone but only when present in fixed proportions. "[1]

VITAMIN D "During pregnancy and lactation VITAMIN D is required both for the mother and the child."[2]

Each *Nutritive Capsule* supplies 400 units of vitamin D.

RIBOFLAVIN "... the daily requirement of RIBOFLAVIN is increased in pregnancy lactation and fever"[3]

Each *Nutritive Capsule* supplies 2 mg. of riboflavin.



"IRON which form the iron protein combination of hemoglobin and prevents anemia.

Each *Nutritive Capsule* supplies 30 mg. of Ferrous Sulfate.

"... VITAMIN B requirements are increased in the pregnant and nursing woman."[3]

Each *Nutritive Capsule* supplies 2 mg. of vitamin B_1

Dosage: One capsule three times daily or more if indicated.
Packaging: Bottles of 100 and 1000.

BIBLIOGRAPHY (1) De Lee, J. B. and Greenhill, J. P. Principles and Practice of Obstetrics, Saunders, Philadelphia, 1947, p. 95 (2) Bicknell, F. and Prescott, F. The Vitamins in Medicine, Grune and Stratton, New York, 1947, p. 643 p. 139 p. 226.

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INDEX TO ADVERTISED PRODUCTS

Aminophyllin (H E Dubin Laboratories, Inc) 2004
Auralgan (The Doho Chemical Corporation) 1999
Belexon (American Pharmaceutical Company) 1984
Beminal (Ayerst, McKenna & Harrison Limited) 1991
Ca-Ma-Sil (Ca-Ma-Sil Company) 1994
Cepacol (The Wm S Merrell Company) 2nd cover
Creamalin (Winthrop-Stearns Inc) 1989
Crysticillin (E R Squibb & Sons) 2090
Daxalan-Dome Paste (Dome Chemicals Inc) 2079
Degalol (Ames Company, Inc) 1987
Diaparene (Homemakers' Products Corporation) 2009
Digilanid (Sandoz Chemical Works, Inc) 1988
Digitaline Nativelle (Varick Pharmacal Co , Inc) 2002
Diodoquin (G D Searle & Co) 1993
Donnatal (A H Robins Company) 2001
Doxychol-K (George A Breon & Company) 2082
Guiathyme (Harmon Chemicals, Inc) 2081
Hemaboloids (The Arlington Chemical Company) 1992
Iletin (Eli Lilly and Company) 2014
Kondremul (The E L Patch Company) 1996
Koromex (Holland-Rantos Company, Inc) 2080
Mandelamine (Nepera Chemical Co , Inc) 2008
Mercuhydrin (Lakeside Laboratories, Inc) 2013
Neo-Antergan (Merck & Co , Inc) 2005
Nucarpon (Standard Pharmaceutical Co , Inc) 2089
Nutritive Capsules (Parke, Davis & Company) 2003
Oleum Percomorphum (Mead Johnson & Co) 4th cover
Ol-Vitum Drops (Ives-Cameron Company, Inc) 2084
Ovaltine (The Wander Company) 2075
Picragol (Wyeth Incorporated) 2077
Ramses (Julius Schmid, Inc) 2092
Raysal with Succinate (Raymer Pharmacal Company) 2085
Scorbutone (Novocol Chemical Mfg Co , Inc) 1986
Sodascorbate (Van Patten Pharmaceutical Co) 2081
Sodium Sulfacetimide (Schering Corporation) 1995
Sulfonsol (The National Drug Company) 2007
Syrup Choline (Flint, Eaton & Co) 2086
Tarbonis (The Tarbonis Company) 2094
Thesodate (Brewer & Company, Inc) 2073
Thum (Num Specialty Co) 2081
Trasentine-Phenobarbital (Ciba Pharmaceutical Products, Inc) 3rd cover
Vifort (Endo Products Inc) 2012
Westsal (Westwood Pharmacal Corp) 2011

Dietary Foods

Baby Foods (Beech-Nut Packing Company) 1997
Evaporated Milk (Carnation Milk Company) 2000
Evaporated Milk (Nestle's Milk Products, Inc) 2083
Malt Soup Extract (Borcherdt Malt Extract Company) 2079
Milk Stout (Whitbread & Co , Ltd) 2087
Similac (M & R Dietetic Laboratories, Inc) 2088

Medical & Surgical Supplies

Artificial Eyes (Fried & Kohler, Inc) 1983
Artificial Limbs (J E Hanger) 2087
Carbon Dioxide Baths (Saratoga Springs Authority) 2010
Hydrogalvanic Generators (Teca Corporation) 1990
Orthopedic Shoes (Pediforme Shoe Co) 2081
Supports (S H Camp and Company) 1998
Supports (Wm S Rice, Inc) 2004

Miscellaneous

Brioschi (G Ceribelli & Co) 2079
Candy (National Confectioners' Association) 2006
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ACTIVE DIURETIC • MYOCARDIAL STIMULANT
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In Bronchial Asthma, Paroxysmal Dyspnea, Cheyne-Stokes Respiration.

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Significant Clinical Results in Certain Allergic Disorders

Extensive clinical investigation has established that

★ *Neo-Antergan* produces EFFECTIVE SYMPTOMATIC RELIEF in a high percentage of patients with certain allergic manifestations

★ This remarkably efficient histamine antagonist possesses a WIDE MARGIN OF SAFETY

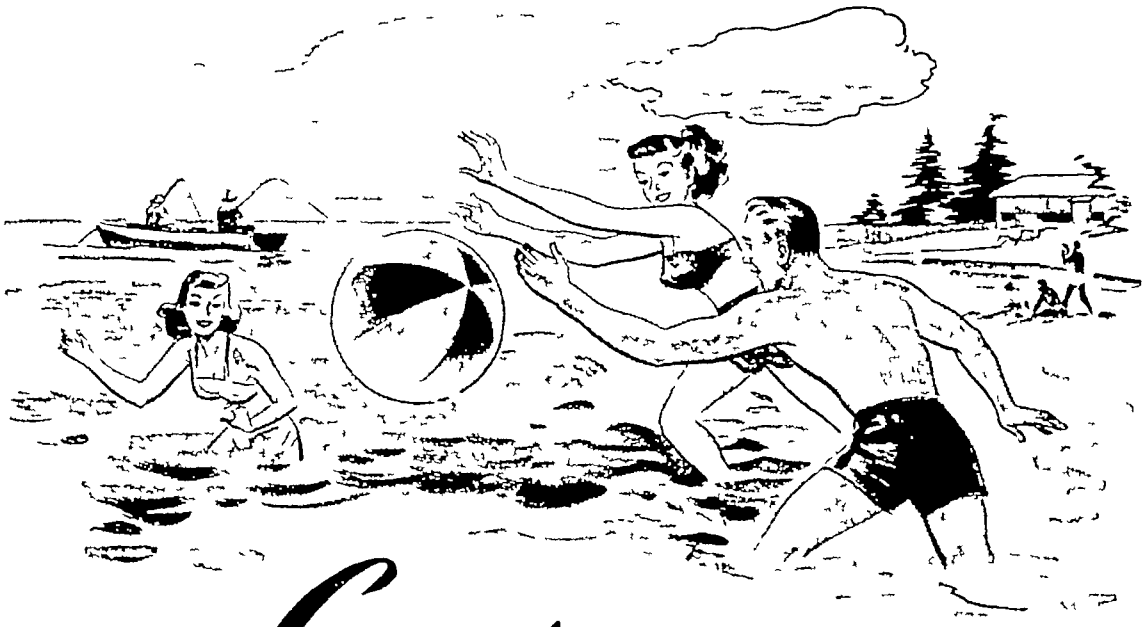
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The majority of patients readily tolerate the average therapeutic dose of 50 mg., two to four times daily In some cases, 25 mg , two to four times daily, will afford appreciable symptomatic relief with minimal side effects Side reactions, when they occur, have been found to be generally mild and transient. Discontinuance of treatment has been necessary only in *approximately 1½ per cent* of patients

Your local pharmacy stocks Neo-Antergan in 25 mg and 50 mg tablets supplied in packages of 100 and 1 000

INDICATIONS HAY FEVER PRURITUS URTICARIA VASOMOTOR RHINITIS ATOPIC DERMATITIS ECZEMA ALLERGIC DRUG REACTIONS and certain other allergic disorders





Candy AND OUTDOOR ACTIVITIES

MANY persons whose daily work involves relatively little physical exercise are likely to overindulge in outdoor activities during the summer months, particularly during vacation periods This increase of physical activity and energy expenditure must be met by augmented nutrition, the need for which is frequently made apparent by sudden hunger or decreased stamina, both of which call for immediate relief

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MICRO CRYSTALLINE
DIAZINE
SULFA
MERAZINE

2 HOUR BLOOD LEVELS[1]
ADDITIVE THERAPEUTIC EFFECT[2]
LESS TOXIC[3]

SULFONSOL—A DELICIOUS LIQUID SUSPENSION OF MICRO CRYSTALLINE SULFADIAZINE AND SULFAMERAZINE—Is far superior to bulky tablet medication Each 8 cc. (2 teaspoonfuls) Is therapeu tically equivalent to the standard half gram (0.5 Gm) sulfonamide tablet. Since each drug is present in micro crystalline form a de sired total sulfonamide blood level Is attained in 2 hours instead of the usual 6 hours.

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micro-crystalline sulfadiazine-merazine

The therapeutic effects of sulfadiazine and sulfamerazine are ad ditive—yet these two drugs are independently soluble in body fluids. Hence their simultaneous administration on the basis of total sulfonamide content constitutes the logical answer to the problem of crystalluria which frequently follows the administration of full doses of either drug alone Furthermore the serious toxic reactions occasionally associated with sulfathiazole such as hema turia are seldom encountered following the use of sulfadiazine or sulfamerazine

Supplied in bottles of 2 4 and 16 fluidounces.

1 Brinkhous, J. C., Phillips, F. J. & Tipple, H. F.: Am. J. Med. Sci., 210:141, 1945.

2. Lehr, D., Elsbach, L. B. & Greenberg, W. B.: J. Pediat., 29:275, 1946.

3. Lehr, D.: Proc. Soc. Exper. Biol. & Med. 64:393, 1947

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MANUFACTURERS OF PHARMACEUTICAL, BIOLOGICAL AND BIOCHEMICAL PRODUCTS FOR THE MEDICAL PROFESSION

EFFECTIVE URINARY ANTISEPSIS *without* OCCURRENCE OF DRUG-FASTNESS

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REG U S PAT OFF

Brand of Hexydaline
(Methenamine Mandelate)

Clinicians recognize that the value of many otherwise effective antibacterial agents is limited by the potential development of drug-fastness

MANDELAMINE* therapy is conspicuously free of this disadvantage[1] [2]—a feature that is especially welcome when therapy is prolonged or must be repeated. MANDELAMINE exhibits a broad range of therapeutic activity, is well tolerated, and is virtually nontoxic in recommended doses

MANDELAMINE offers these **6** outstanding advantages

1 No gastric upset
2 Wide antibacterial range
3 No accessory acidification (except when urea splitting organisms are present)
4 No fluid regulation—no dietary restriction
5 No danger of drug-fastness
6 *Simple oral dosage*—3 or 4 tablets three times a day

SUPPLIED Enteric-coated tablets of 0.25 Gm (3¾ grains) each, in packages of 120 tablets sanitaped, bottles of 500 and 1,000 tablets

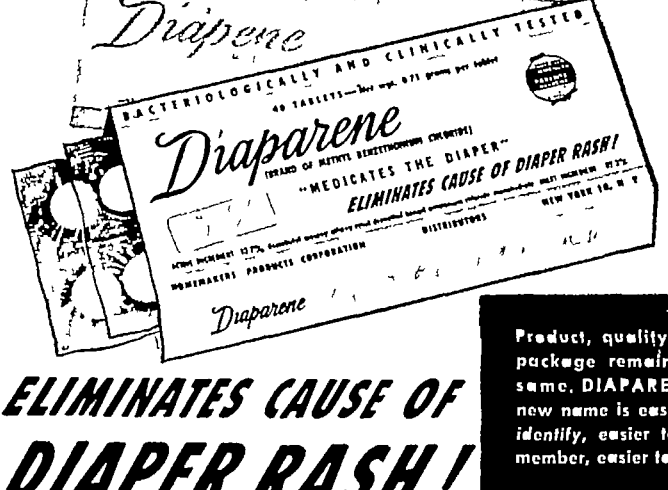
*MANDELAMINE is the registered trademark of Nepera Chemical Co., Inc., for its brand of Hexydaline.

1 Duca, C J and Scudi, J V: Proc. Soc. Exper Biol & Med. 66: 123 (1947)
2 Scudi, J V and Duca, C J: J Urol. (to be published)

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ELIMINATES CAUSE OF DIAPER RASH!

DIAPARENE is the *first* and *only* non mercurial non volatile diaper bacteriosta sis thoroughly tested in laboratory and clinic to prevent formation of urinary am monia in the urine wet diaper—the direct cause of *ammonia dermatitis* and ulcera tions of the external urinary meatus[1]

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REFERENCES:

1 Cooke J V: Brennemann Practice of Ped 4: Chapter 41 1945

2. Benson, R. A et al: J Ped 31:369 754 1947

3 Sullivan N: Int'l Congress of Ped Mt Sinai Hospital New York 1947

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Dr.....

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City.....Zone.....State.....

I average.....diaper rash cases weekly

Findings from the Saratoga Spa records*



CARBON DIOXIDE BATHS

Many observations have been made on the changes which occur in the alveolar carbon dioxide tension, the skin temperature, and the respiratory metabolism of human subjects who have been submerged in baths of either carbon dioxide water or plain water

The alveolar carbon dioxide tension showed a 5 to 10 per cent rise during baths in the carbon dioxide water, and returned to the resting level about twenty minutes after the bath There was no significant change during baths in plain water

There was no essential difference in the skin temperature during the carbon dioxide and plain water baths

There was a marked increase in the elimination of carbon dioxide in the expired air during the time the patient was in the mineral water bath This increase did not occur in the plain water bath

No evident variation in the oxygen consumption occurred with either bath

The possible source of the excess carbon dioxide is discussed The evidence supports the theory that this extra carbon dioxide is obtained by absorption of the carbon dioxide in the water through the skin and its subsequent elimination through the lungs

It is, therefore, concluded that the results obtained in the treatment of patients with carbon dioxide mineral water baths depend, in part, at least, on the absorption of carbon dioxide through the skin and its subsequent influence on the circulation and nervous system which occurs in the process of its natural elimination by way of the blood stream and the lungs

** As printed in American Heart Journal Vol. 29 No. 1 Pages 44 61 January 1945*

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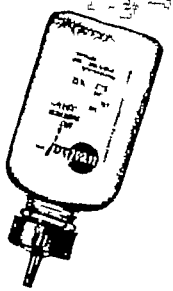
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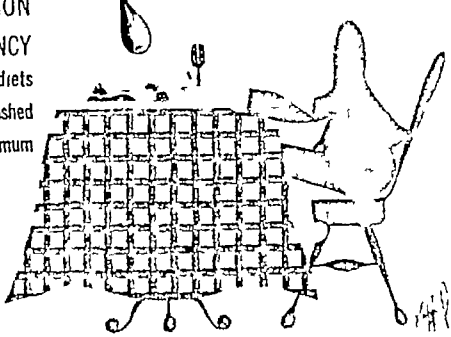
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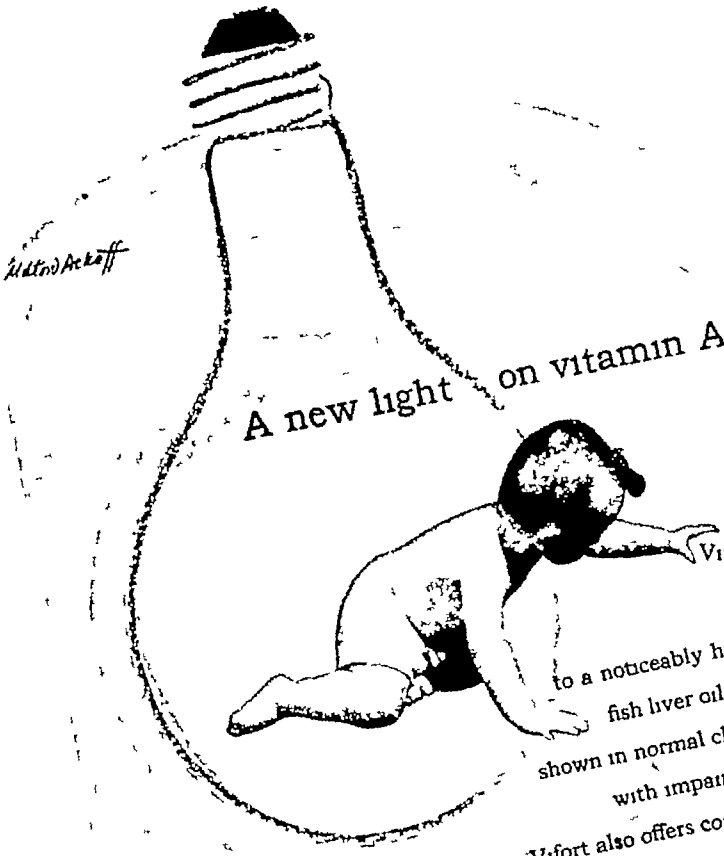
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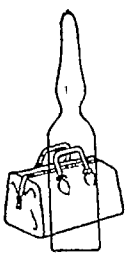
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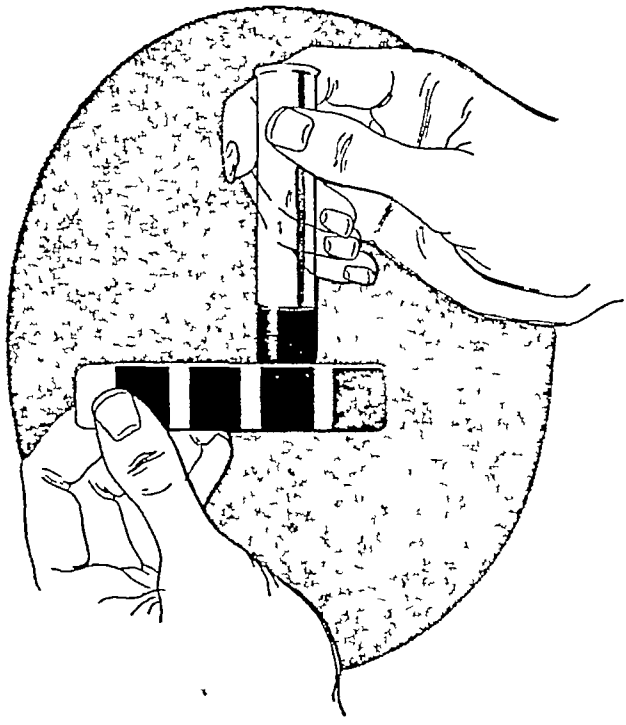
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BIBLIOGRAPHY: (1) Fishberg, A. M.: Heart Failure 2nd ed. revised Philadelphi Lea & Febiger 1946 p. 736 (2) Levine S. A.: Clinical Heart Disease 3rd ed. revised Philadelphia, Saunders 1947 p. 278. (3) New and Nonofficial Remedies, 1947 p. 304 (4) Resser P B. and Burch G E.: Proc. Soc. Exper Biol. & Med. 63:543 1946 (5) Modell, W Gold, H. and Clarke D. A.: J Pharm. & Exper Therap. 84 264 1945 (6) DeGraaf A. C. and Nadler J E.: J.A.M.A. 119:1006 1942 (7) Wexler J and Ellis L. B : Am. Heart J 27 86 1944 (8) Conf erences on Therapy: New York State J Med. 44:280 1944; 46:61 1946; 46:69 1946.

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VOLUME 48 SEPTEMBER 15 1948 NUMBER 18

Editorials

Doctors and the Selective Service Act

As enacted, the Selective Service Act of 1948 states, "No person shall be inducted for training and service unless and until he is acceptable to the armed forces for such training and service and his physical and mental fitness for such training and service has been satisfactorily determined under standards prescribed by the Secretary of Defense.

"No person shall be inducted until adequate provision shall have been made for such shelter, sanitary facilities, water supplies, heating and lighting arrangements, *medical care and hospital accommodations for such person** "[1]

In the absence of an adequate medical staff, the obvious alternative would be to hold up inductions pending the acquisition of sufficient medical personnel or to amend the act

Says the New York *Times* [2]

In addition to the 3 900 young medical doctors the Army needs 1 300 interns and resident physicians or a total of 5,200 medical graduates. For the proper care of 1 360 000 troops, the Army Medical Department has set its sights at 6 900 doctors It now has 3,000, including interns At least 450 veterinarians are needed for food inspection

There was not official announcement of the Army determination to seek the change in the Selective Service Law, but officials, cognizant of the problems of young doctors, believed they should be on notice however informally of the inevitability of inducting large numbers of them.

Revision of the Selective Service Act of 1948 would have to await the convening of the next Congress in January, 1949 and would then drag through a month or so of debate It seems unlikely to us that such a revision of the act will be necessary even though Army officials believe that faced with the certainty of a draft many young doctors and dentists would want to volunteer for active service to qualify for the many unusual incentives recently authorized Congress raised the pay of all medical

* Italics ours—Ed.
[1] Public Law 759 80th Congress, Chapter 625, 2nd Session approved, June 24 1948 p. 2.
[2] Aug. 12, 1948.

officers by $1,200 a year, or to $380 a month for a year's internship In addition, young doctors are commissioned as first instead of second lieutenants

The A M A has already called on young doctors educated during the war at government expense to volunteer for service under the new draft law "They owe an obligation to the government and to the people of the United States," the *Journal* said editorially The *Journal* termed the need for medical services in the armed forces "exceedingly critical," saying nearly 6,000 physicians will be required within a year

Most of the young doctors who served in the last war are "not inclined to volunteer," the editorial said It added that many were "bitter in their recriminations as to faults which they observed in utilization of the medical profession"

"However," it went on, "some of these faults were so obvious that military leaders have already taken steps to bring about correction"

The *Journal* said there were "thousands of young men who were educated at government expense in the A S T P and the V-12 programs who did not render actual military service" The positions open, the *Journal* said, "should appeal particularly to the young men who have graduated in recent years, since they offer opportunity for training in a specialty with an adequate income, housing, and maintenance, not available through any other source"

Should an amendment to the law become necessary in 1949, it is probable that such legislation would not name doctors, dentists, or veterinarians as such but would direct the President to order the registration and induction of personnel "having the professional skill and training to provide for the proper implementation of an expanded military establishment"

The medical profession has never yet failed to meet its obligations to the armed services of the nation In spite of the unusual circumstances of a peacetime draft, we believe that the profession will fulfill its obligations on a voluntary basis

,Health Deficits Studied

Careful analysis of the work done by the more than 800 representatives of medical, public health, and nonmedical groups composing the National Health Assembly, May 1 to 4 of this year, will convince the serious student of the health needs of the country that much was accomplished F S A Administrator Ewing and Dr Howard Kline appear to have been chiefly responsible for the well chosen personnel of the final executive committee of thirty-nine persons with official representation for the American Hospital Association, the American Dental Association, the Conference of State and Provincial Health Officers, the American Medical Association, and similar bodies

In this assembly the American Medical Association was represented by competent experts in each of the fields concerned Several members of the Council on Medical Service participated in the panel on medical care Chairmen in several sections, notably maternal and child health, research, local health units, medical care, physical medicine, hospital facilities, and mental health, were distinguished Fellows of the American Medical Association Members in adequate numbers served on the panels devoted to rural health, community organization, public health, hospitals, personnel, and environmental sanitation The Association had available, moreover, its public relations and publicity staff and additional members on the executive committee [1]

The objectives as stated by Mr Ewing in terms of deficits were sharply defined

> First, we need action in areas of shortage—manpower, hospitals, public health organization, and facilities The findings of the Assembly made it all too clear that we do not have enough doctors, dentists, nurses, medical technicians, and public health workers of all kinds We do not have enough hospital beds, particularly for mental cases and for the victims of heart disease We are short on public health facilities One third of the 3,070 counties of the nation do not have a full-time public

[1] J A M A 137 146 (May 8) 1948

health officer In those that do, only 3 4 per cent of the people are served by health depart ments with enough staff and facilities to meet accepted minimum standards

In addition to shortages, we have bad distribution Shortages are more acute in some states and regions than others, more acute in rural areas than in big cities more acute among Negro Americans than among white Americans. We need to expand our profes sional schools and training centers, rai e the standards of many of them, make it possible for able and ambitious young people to finance their professional education [1]

Second, we need to take definite steps to abolish discrimination in training and in health service. Here education is the crux of the problem Obviously, an ignorant nation cannot be a healthy nation We need to re vamp our scheme of things so that the 6 000 000 children of school age who are not now in school will have their fair chance

Third, we must solve the problem of paying for medical care, so that the costs of sickness will not break the backs of families and so that modern medical care to prevent illness and conserve health will not be beyond the reach of the average family budget This was one of the great new areas of agreement staked out by the Assembly Distinguished spokesmen for the American Medical Association joined with representatives of labor, farmers consumers, and other groups in declaring that the prin ciple of contributory health insurance should be the basic method of financing medical care for the large majority of the American people"

There are various alternatives proposed for action here. I myself am on record as favoring compulsory health insurance but I am not intransigent National health insurance is not a goal in itself I see it as the best method of reaching the real goal—to bring medical care to all the people If anyone can show me a better method I'll switch like a shot

Doubtless the report of the executive committee charged with the final responsi bility for evaluating the recommendations from the different panels and sections will propose specific ways to meet the health deficits of the nation While the areas of agreement noted by Mr Ewing are large, they are not, in our view, by any means wholly cultivated

As this is written, the likelihood of a change in the administration of the govern ment of the United States looms as a possi bility Both the suspect National Health Conference of 1938 and the National Health Assembly of 1948 were sponsored by the same political party Mr Ewing called the 1948 Assembly in response to a request by the President of the United States for a long-range health program to cover the next ten years The effect of a putative change in the political party in power on the conclusions reached by the current Assembly may be far reaching It might well serve to reduce still further the remaining areas of disagreement, the chief one of which is the matter of compulsory health insurance, to which the current administration has been committed, if not by conviction at least by inheritance

Continually worsening diplomatic rela tionships in Europe must not be casually dis counted Considering the obligations this nation has assumed for the implementation of the Marshall plan, we would seem to be committed to a more and more difficult task For assuredly the E R P is basic in reducing the health deficits in Western Europe We are thus inextricably involved in both a foreign and a domestic health prob lem, neither one of which can be wholly separated from the other

Domestic increases in the cost of living, the critical situation both with respect to finances and personnel, of our voluntary hospitals, and the peacetime selective service act with its inevitable requirement of more physicians add urgency to the necessary evaluation of our domestic health deficits.

[1] The Survey Midmonthly June 1948 p. 183.

Current Editorial Comment

The Status of Penicillin Treatment of All Forms of Syphilis The myriad forms it may assume in the human body has made syphilis and its treatment subjects of pro found interest and importance to every doctor of medicine, whether general prac titioner or specialist The review by Altshuler *et al* of the total knowledge ac-

cumulated at the end of the first four years of its use acknowledges that today our principal weapon against syphilis is penicillin [1] Under many headings, containing a wealth of facts and details concerning penicillin in the therapy of all forms of syphilis, the authors consider its chemistry, pharmacology, toxicity, unpleasant reactions, penicillin resistance, effects on syphilis of penicillin used against other diseases, the results in 18 forms or clinical types of syphilis treated with penicillin, concluding with post-treatment observation

The preparation most effective against syphilis of any type in man is crystalline penicillin G It should be dissolved in sterile water or isotonic sodium chloride solution, 50,000 to 100,000 units per cc , and injected in doses of 20,000 to 100,000 units every two or three hours, day and night All doses should be given intramuscularly The duration of one course of treatment should never be less than seven and one-half days (60 doses) Some serious cases of neurosyphilis may require a course of twelve to twenty days and a total dose of 10 to 20 million units (180 or more doses), together with induced malarial fever

Of the 18 types of syphilis treated with penicillin, the results were good in nine early, latent, benign late, iritis, congenital, asymptomatic neurosyphilis, symptomatic neurosyphilis, acute syphilitic meningitis, and syphilitic nerve deafness In dementia paralytics, the results were moderately good, in cardiovascular and in optic atrophy, undetermined, keratitis, uncertain, tabes, variable, diffuse meningosyphilis, fair, epilepsy, questionable, Erb's spastic paraplegia, poor, and in the prevention of prenatal syphilis, the results are excellent

Other pertinent observations include the following In the treatment of syphilis, do not administer penicillin by the oral route, do not use penicillin by the intrathecal route, since penicillin is relatively nontoxic for man except when administered intrathecally Crystalline penicillin G in peanut oil and beeswax may be used in doses of 600,000 units intramuscularly once a day for ten days, a total dose of 6,000,000 units The reports of serious reactions to amorphous or purified penicillin are rare and include no deaths Penicillin treatment for gonorrhea may delay or suppress the lesions of syphilis Ajuvant therapy with arsenic, bismuth, or fever should not be used with penicillin during the first course of treatment, but they may be helpful and necessary in treatment of relapses In preventing prenatal syphilis, penicillin is nearly 100 per cent effective If the infant is seronegative and otherwise normal at four months of age it may be dismissed as nonsyphilitic

Those treated for early syphilis or infantile congenital syphilis or pregnant women with syphilis should return once a month for a careful inspection and examination and for blood serologic tests for syphilis quantitatively titered Seroresistance after penicillin is the rule in late latent syphilis as it is after all other forms of treatment In neurosyphilis, the two most important tests of the spinal fluid are the cell count and the quantitative estimation of protein In neurosyphilis, the spinal fluid should be retested every six months for a period of two to three years and annually for the duration of life This excellent report deserves to be rated as a reference work for handy use in every doctor's library

[1] Syphilis Study Section of the National Institute of Health, U S Public Health Service J A.M A 136 873 (Mar 27) 1948.

Photoroentgen Findings at Annual Meeting The New York State Department of Health has informed the JOURNAL of the results of its first chest survey project during the Annual Meeting of the Medical Society of the State of New York, 1948

> The State Health Department's photoroentgen equipment, which was on exhibit at the Annual Meeting of the State Medical Society during May 17–21, x-rayed the chests of 608 persons, of whom 381 were physicians Shadows indicative of pulmonary tuberculosis were found in nine individuals, or 1 5 per cent of the total number examined In every case, however, the tuberculosis was considered to be probably inactive In addition, six persons showed evidence of significant nontuberculous, intrathoracic abnormalities, among whom were two with possible cardiovascular disease and one suggestive of new growth

Total attendance at the meeting was approximately 6,000 persons, 10 per cent of whom availed themselves of the opportunity provided by the State Health Department That 381 physicians out of the 5,251 who attended the meeting took time to have their chests x-rayed is gratifying

We hope that the State Department of Health will consider repeating this feature of its exhibit at the next annual meeting

Scientific Articles

SURVEY OF RAGWEED POLLINATION IN THE NEW YORK METROPOLITAN DISTRICT IN 1947

EUGENE H WALZER M D BERNARD B SIEGEL, M.D ROBERT A CHAIT M D and MATTHEW WALZER, M D Brooklyn New York

(From the Division of Allergy Jewish Hospital of Brooklyn)

IN 1946, the first extensive survey of ragweed pollination in the New York Metropolitan District was reported [1] The study was made in collaboration with the Pollen Committee of the Research Council of the American Academy of Allergy

Because ragweed pollination in New York and neighboring states proved to be light and atypical in 1946 the objectives of the investigation, as enumerated in the previous report, were not achieved It became apparent that conclusions could not be drawn on many phases of the problem until data were collected for several seasons in which pollination could be studied under vary ing weather conditions It was decided, therefore, to continue annual surveys of ragweed pol lination for several years

In this communication the results of the rag weed pollen survey of the New York Metropolitan District in 1947 are presented

Technic

The technic employed was that recommended by the Pollen Survey Committee of the American Academy of Allergy [2] Slides with a thin coating of vaseline were exposed for twenty four hour periods in the Durham shelter The slides were stained with Calberla's solution, and the pollen grains under a cover slip (4.84 sq cm.) were counted under the low power objective of a microscope. Pollen counts were reported in terms of the number of ragweed granules found on a square centimeter of slide after a twenty four hour exposure. Approximately 1 000 slides were counted by two of the authors. The margin of error was minimized by frequent checks on the same slides by both observers.

Location of Exposure Stations

The area surveyed was arbitrarily divided as follows (1) New York City, (2) localities within a 50-mile radius of the approximate center of New York City and (3) cities outside the 50-mile radius.

The sites and localities selected for exposure of slides were as follows

New York City

Bronx Montefiore Hospital Manhattan Belvedere Tower in Central Park Staten Island Sea View Hospital Brooklyn Jewish Hospital of Brooklyn Queens—Jamaica Jamaica Hospital Flushing Chamber of Commerce Building Rockaway Rockaway Beach Hospital

Localities Within a 50-Mile Radius

New Jersey—New Brunswick St Peter's General Hospital Maplewood Fire Station Building, Verona Five-story apartment build ing Teaneck Five-story apartment building

New York State.—Croton-on-Hudson Three-story high-school building, White Plains White Plains Hospital Garden City, Long Island Coast Guard Weather Station.

Cities Outside the 50-Mile Radius

Connecticut—Waterbury Waterbury Hospi tal New Haven Grace Hospital.

For purposes of comparison pollen counts were also obtained for Washington D C from Dr Eloise Kaulin and for Philadelphia, Pennsylvania from Dr George Blumstein. Both workers employed the same standard technic.

In most instances the exposure sites were the same as those used in the 1946 survey An old type shelter which had been employed for expos ing slides for about twelve years was placed along side the standard Durham shelter on the roof of the Jewish Hospital of Brooklyn In this man ner, the results obtained with the old and new technics could be compared

Results

The daily counts at the various stations are graphically portrayed in Fig 1 representing the

Presented at a meeting of the New York Allergy Soci ty May 6 1948.

Aided by a contribution from the Celia Antonoff Research Fund.

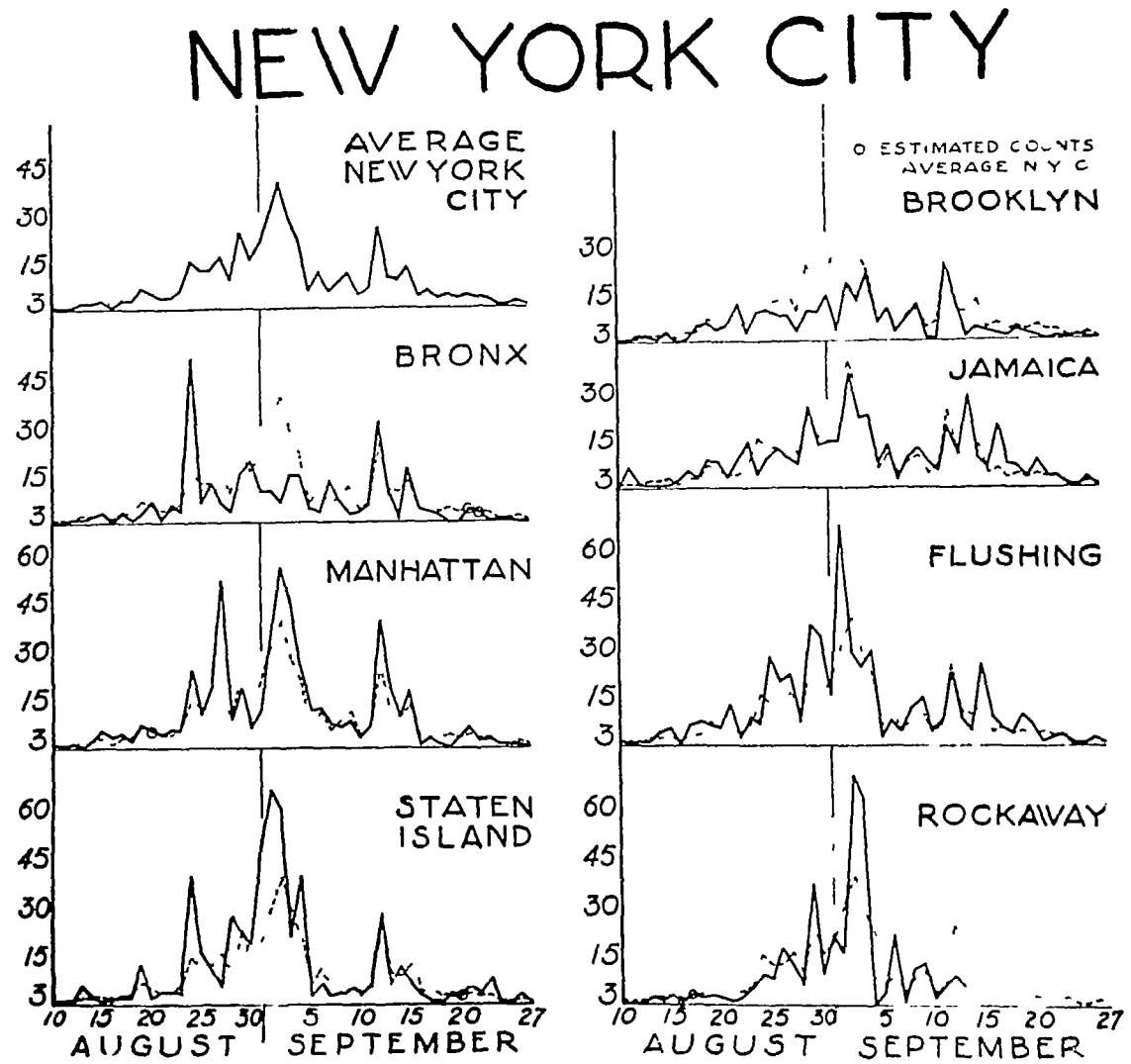


FIG 1

stations within New York City, and in Fig 2, representing the stations within a 50-mile radius of the center of New York City The daily figures noted in the charts represent the number of ragweed pollen granules per square centimeter of slide per twenty-four hours Circles represent days on which the pollen counts were unobtainable For these days, pollen counts were estimated by averaging the counts obtained in the surrounding areas In this way the statistical error which resulted from the loss of a reading was minimized The vertical line extending through the middle of each graph separates the months of August and September

Although counts were done at most of the stations from August 1 through September 30, the pollen charts shown include only the period from August 10 through September 27

Figures 3 and 4 represent the seasonal totals, which were the sums of the daily pollen counts obtained from August 1 through September 30 Where seasonal totals were incomplete, the missing counts were estimated, such readings being represented by the extensions beyond the dotted lines within the blocks

New York City

The daily pollen counts for the seven stations in New York City were averaged and used to plot a curve for the entire city from August 10 to September 27 inclusive (Fig 1) The first traces of ragweed pollen in New York City appeared on August 1 Pollen concentration was minimal until August 24, when an average count of 15 was obtained On August 29, an average of 23, the highest for the month, was recorded The peak of the season occurred on September 2 with a

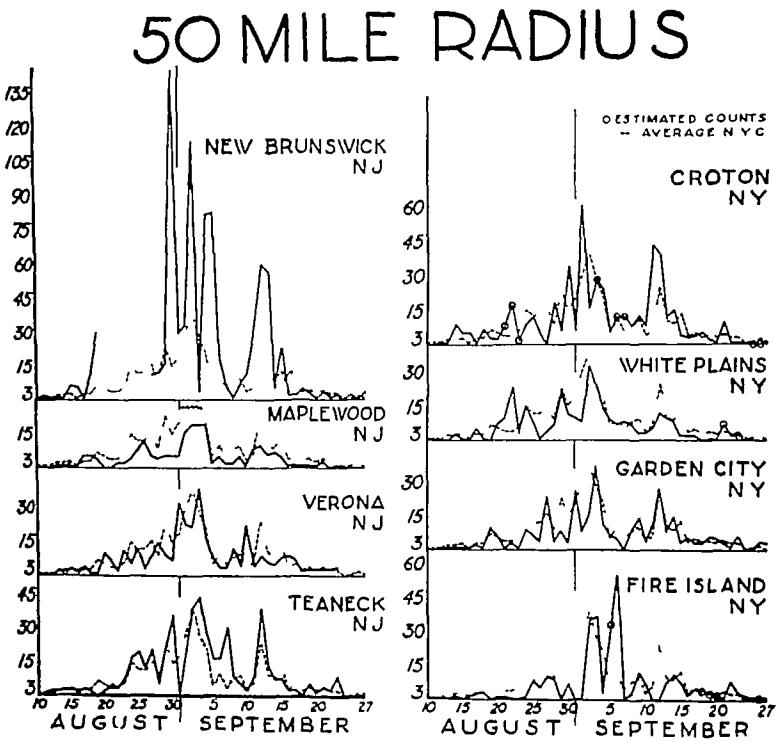


FIG 2

count of 39 By September 5 the count had dropped to five and remained low On September 12 there was a secondary rise to 25 Thereafter only traces of pollen were detected The seasonal total of the average daily counts for New York City from August 1 to September 30 was 423 (Fig 2)

The highest count for the season (50) in the Bronx occurred in August The early September peak seen in the curves of most of the other New York City stations was absent in the Bronx. The seasonal total for the Bronx was 310

The Manhattan pollen curve followed the average New York City curve rather closely although the peaks were of a greater magnitude. The seasonal total (508) was greater than the average for New York City (423)

Staten Island had the greatest pollen density in the city (530), which was about 20 per cent higher than the average for New York City The pollen curve was similar in contour to the average New York City curve but showed higher peaks

Brooklyn had low counts during August and early September with the highest count appearing in mid-September The seasonal total at this station (271) was lower than the New York City average

At Flushing in Queens the peaks were of a higher order than in the average curve and several minor spills were noted in mid-September The seasonal total was 518 At Jamaica and Rockaway in Queens similar curves were noted The seasonal totals at these stations approximated the average New York City total (423)

Localities Within a 50-Mile Radius

New Jersey (Figs 2 and 4)—New Brunswick pollen counts were the highest recorded in the

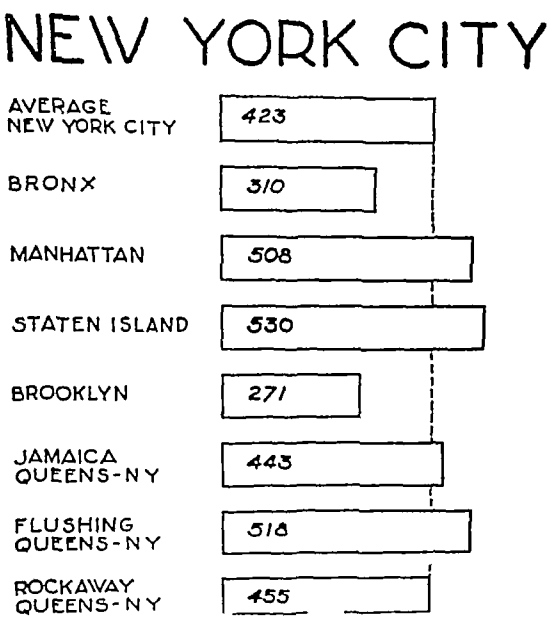


FIG 3

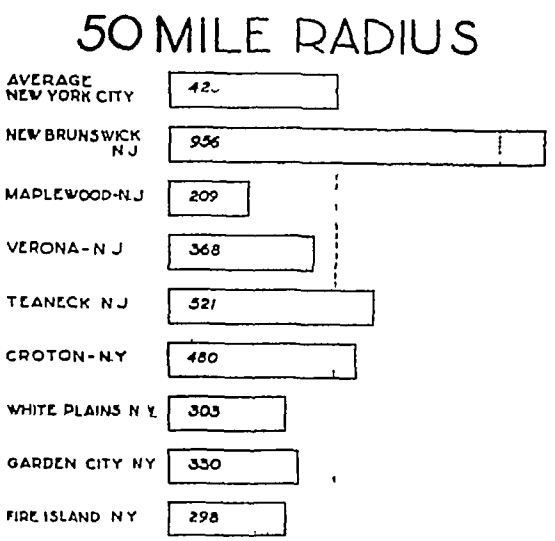


FIG 4

entire survey As a result of damage to the slides, no counts were available for the week starting August 20 On August 30, the count was 144, the highest reading of the entire metropolitan survey The estimated seasonal total at New Brunswick was 956, about twice the average for New York City (423)

Maplewood had the lowest pollen concentration of any station of the metropolitan area The seasonal total (209) was about one half the average for New York City

The pollen curve at Verona was similar to the average New York City curve The seasonal total here was 368

The peaks at Teaneck were somewhat higher than in the average New York City curve The seasonal total of 521 in Teaneck exceeded the average of New York City

New York State (*Figs 2 and 4*) —At Croton the peaks of the pollen curve and the seasonal total (480) were slightly higher than the average of New York City

Except for pollen spills during the third week in August, the White Plains pollen curve followed the average New York City curve closely at a slightly lower level The seasonal total at this station was 303

The Garden City pollen curve also followed the average New York City curve at a somewhat lower level The seasonal total here was 330

Except for several significant pollen spills during the first week of September, counts at Fire Island were low The seasonal total at this station (298) was substantially lower than the averages for New York City (423)

Cities Outside the 50-Mile Radius

The seasonal total (192) for Waterbury, Connecticut, was lower than any recorded in the metropolitan survey The pollen density for the season in New Haven, Connecticut, (434) was approximately equal to that of New York City (423) The Washington, D C, total (585) exceeded that of New York In Philadelphia, the seasonal total of 708 was almost twice the average for New York City

Counts Obtained with Old Shelter in Brooklyn in 1947

Slides were exposed in the old shelter on the roof of the Jewish Hospital of Brooklyn during this survey as they had been each year since 1936 With this technic, the 1947 seasonal total (782) was 44 9 per cent of the twelve-year seasonal average (1,741)

Discussion

Within New York City, ragweed pollen density in Brooklyn and the Bronx was less than that of the average for the city as a whole (Fig 3) Seasonal totals at Jamaica and Rockaway were approximately equal to the average for New York City, whereas Manhattan, Flushing, and Staten Island totals were greater than the average for New York City

Of the stations within a 50-mile radius of New York City, the seasonal totals at Maplewood, Fire Island, White Plains, Garden City, and Verona were all lower than the average for New York City (Fig 4) The pollen density in Cro-

ton and Teaneck exceeded the New York City average. The highest seasonal total recorded in this survey was noted in New Brunswick, New Jersey

At most of the stations included in the survey, three pollen spills were noted in 1947 The first occurred during the last week in August, the second, the highest of all, occurred during the first week of September, and the third, during the second week of September

Throughout most of the season the daily counts at Fire Island, considered to be a hay fever resort, were low On only three days in early September did the counts exceed 35 On the basis of seasonal totals, however, the pollen density was lower in Brooklyn and in Maplewood than it was at Fire Island

As in 1946, the 1947 ragweed pollen crop was light in New York City and its environs. The seasonal total (782) obtained with the old shelter in Brooklyn was only 44.9 per cent of the average for the last twelve years (1,741) The years 1946 and 1937 also showed low seasonal totals, with 50 8 per cent and 40 3 per cent, respectively, of the twelve-year seasonal average.

The paucity of pollen in 1947 was reflected in other eastern cities. In Philadelphia, Washington, D C , Waterbury, New Haven, Verona, and Croton, counts did not differ much from those obtained in 1946, which was also a year of light pollination

Weather factors which may have contributed to the low counts in New York include an excess of rainfall in August and low wind velocity during most of August and early September

It is not yet possible to evaluate the influence of the ragweed extermination program, conducted by the New York City Department of Health, on the ragweed counts in this city The ragweed elimination campaign in New York City during 1947 was reported to be more intensive than in 1946 Despite this fact, counts at four of five stations within the city were higher in 1947 than in 1946 Ragweed extermination programs were not carried out at Verona Croton Waterbury, and New Haven, and for these cities, seasonal totals were also slightly higher or approximately the same in 1947 as in 1946 However, Philadelphia and Washington D C with incomplete ragweed extermination campaigns showed lower seasonal totals in 1947 than in 1946 It is obvious that in 1947 counts were generally low along the coast in Connecticut New York, New Jersey Pennsylvania, and Washington, D C., as they had been in 1946 Such atypical seasons are unsuitable for determining the effectiveness of extermination campaigns, and it will be necessary to continue pollen surveys through heavy pollination years before any conclusions may be drawn on this question.

Summary

1 The ragweed pollen survey of New York City and its suburbs first performed with a standard technic in 1946, was repeated in 1947

2 The pollen density in this area was comparatively low in 1947 Seasonal totals for the metropolitan stations in the order of decreasing pollen density were Staten Island Flushing, Manhattan, Rockaway, Jamaica, Bronx and Brooklyn.

3 In the area within a 50-mile radius of the center of New York City it was found that the seasonal totals at New Brunswick and Teaneck were greater than the average for New York City The Croton total was about equal to the average of New York City At Verona, Garden City White Plains Fire Island and Maplewood the totals were less than the New York City average

4 Ragweed pollen density in New York City and cities in the neighboring states on the Atlantic coast was generally light in 1947 Because of this fact, the effectiveness of ragweed extermination campaigns in this area cannot be evaluated at this time

References

1 Walker E. H., Sherman J., Chait, R. A. and Walker M. New York State J. Med. 47: 1979 (Sept. 15) 1947

2 Durham O. C. Black, J. H., Glaser J. and Walker M.: J. Allergy 17: 178 (May) 1946.

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EVERY PHYSICIAN A COLUMNIST

Members of the Lake County (Indiana) Medical Society are finding out what a columnist's life is like. A group selected from their ranks prepares a daily health column called "Your Doctor Says," appearing in the *Gary Post Tribune* Panel membership is changed every month, so that the whole medical society will eventually have taken part in the scheme.—*Medical Economics July 1948*

STREPTOMYCIN IN DERMATOLOGY ITS VALUE AND LIMITATIONS

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SELMAN A Waksman, a soil microbiologist, in the late 1930's undertook a study of cultures of micro-organisms from the point of view of antibiotic activity of their metabolic products In 1943 he found an actinomycete, namely Streptomyces griseus, which was capable of producing a powerful antibiotic substance When certain strains of this organism were grown on a suitable medium, a purified, active principle could be obtained This substance, designated "streptomycin," showed definite bacteriostatic activity in vitro against many gram-negative bacilli and against the turbercle bacillus It was also found to be of value in certain experimental infections in animals This discovery was announced in January, 1944 [1] Its clinical possibilities were immediately appreciated, and within a year Hinshaw and Feldman of the Mayo Clinic reported the suppressive effect of streptomycin on tuberculosis in guinea pigs and humans [2 3] Comprehensive clinical trials were subsequently undertaken by the National Research Council [4 5] By the middle of 1946 its indications, as well as its limitations and toxicity, were becoming evident The Veterans Administration, the Army, and the Navy have since been engaged in a joint investigation of streptomycin in the treatment of tuberculosis More than 900 patients were reported on in 1947 [6 7]

We have attempted to consolidate in this paper the results, as available in the literature and in our own experience, of the use of streptomycin in conditions of interest to the dermatologist

General Indications

Streptomycin is rapidly finding its rightful place as an antibiotic In general, it does not appear to enjoy the wide field of usefulness possessed by penicillin, although it has a bactericidal effect against some gram-negative pathogens which are penicillin-resistant, against Mycobacterium tuberculosis, which is likewise not susceptible to penicillin, and in both the systemic and localized types of tularemia against which penicillin is useless Furthermore, it is active against some gram-positive bacteria, including penicillin-resistant and sulfonamide-resistant strains of streptococci, staphylococci, and diplococci

Quite naturally the clinician attempts to compare its administration with that of penicillin This is fraught with considerable difficulty because of fundamental differences in dosage measurement (unit or gravimetric), size (by weight the effectiveness of penicillin is about 200 times that of streptomycin), rate of absorption, excretion, distribution in the body, toxicity, etc Streptomycin solutions are much more stable than those of penicillin and are very alkaline Streptomycin activity is greatest at about pH 9 in contrast to penicillin which manifests its optimum therapeutic effects between pH 6 3 and 6 8 This is important in their topical use

Dosage determination of streptomycin is extremely important, especially as regards its adequacy Variations in susceptibility of pathogens is great, sometimes greater between different strains of the same species than between different species Inadequacy of dosage not only fails to effect a cure but is prone to produce streptomycin resistance in a previously sensitive strain

One cannot, therefore, be too dogmatic concerning dosage other than to recommend that one should determine the type of organism responsible for the infection at hand and administer the total twenty-four-hour daily dosage, as advised, in divided portions at intervals of three to four hours for the prescribed number of days or weeks Failure of a sustained favorable response during continuous therapy may indicate development of bacterial tolerance and necessitate doubling the daily dose or its supplementation by other specific or nonspecific measures

While usually administered as the hydrochloride or sulfate salt by intramuscular injection, streptomycin has been given intrathecally and by inhalation as an aerosol We will limit our discussion of dosage to those conditions of dermatologic interest

Dermatologic Indications

Chancroid —Mortara and Saito found Hemophilus ducreyi remarkably sensitive to streptomycin in vitro [8] Working with rabbits, they were able to prevent formation of experimental chancroid following the intradermal inoculation of a virulent strain If they delayed injection of

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streptomycin, lesions developed but healed faster than those of controls.

Hirsh and Taggart treated 15 patients in an attempt to verify clinically the results of animal inoculation.[9] The patients presented ulcerations bubos, or both Treatment consisted of 1 Gm daily in divided doses every four hours intramuscularly, except in one patient who received 2 Gm daily Treatment was continued until there was evidence of complete healing (five to twenty five days), the larger and multiple lesions healing more slowly These investigators found that recovery was facilitated if the fluctuant bubo was aspirated. There was only one possible relapse occurring six weeks after termination of therapy Thus was in a patient who had received 5 Gm They conclude that doses of 1 Gm daily for short periods are sufficient, that treatment should continue for at least seven days and that sulfonamides are the drugs of choice, but streptomycin is of value in patients not responding or who are sensitive to sulfonamides

Erysipeloid.—There are no clinical reports in this disease Klauder and Rule and Woodbine have investigated experimental Erysipelothrix rhusiopathiae infections in mice.[10 11] However mice develop a septicemic form of infection, it being impossible to produce a cutaneous form of infection corresponding to erysipeloid in man There was some evidence of benefit from streptomycin, but it was only relative in that mice receiving higher doses lived longer than control animals

Gonorrhea.—Although not primarily a disease of dermatologic interest, gonococcal infections are included because of their association with keratoderma blenorrhagicum

Pulaski reported seven cases of gonorrheal urethritis which responded promptly to a course of streptomycin consisting of 0 5 Gm every three hours for six doses.[12] All these patients had failed to respond to penicillin and sulfonamides

Chinn Putnam *et al* reported on 77 cases treated with a single dose of streptomycin in saline given intramuscularly 50 patients receiving 0.3 Gm. or more, showed 100 per cent cure 22 treated with 0 2 Gm showed 90 0 per cent cure and 5 treated with 0 1 Gm showed 40 per cent cure.[13]

Granuloma Inguinale.—Barton and his group reported on three cases treated with streptomycin.[14] One received 20 mg every three hours for forty-one days (0 46 Gm.) Improvement began the eighth day, healing was complete by the thirty-third day, and the patient showed no evidence of relapse two and one-half months after completion of therapy Two other patients received 30 mg every three hours, one for eighteen days the other for twenty-nine days. Healing was evident by the tenth and ninth days respectively, and was complete except for pin point erosions, on the thirty third and thirty first days, respectively However within another two weeks these pinpoint openings had increased in size

Greenblatt Dienst *et al* in 1947 reported on 58 patients.[15] Various dosages were used initially but later a more uniform dosage was finally adopted, consisting of 4 Gm. daily for five days in divided doses This larger dose within a short period was used to prevent development of resistance In three patients with excessive granulation tissue, therapy was continued from ten to thirteen days Response was rapid with objective evidence of healing apparent in forty-eight to seventy two hours, complete healing occurring one to two weeks after termination of therapy Extensive lesions progressed to healing more slowly Four patients relapsed Of these two had received less than 4 Gm total dosage but responded to a second more extended course One did not respond to a second course and one received 40 Gm. with only moderate response

We have treated five patients Three received 20 Gm in five days All showed rapid improvement with healing of the lesions and are still well two months after completion of therapy One patient with lesions of thirteen years duration refused further therapy after having received 8 5 Gm in fifty-one hours. Fourteen days later the lesions had almost completely healed except for several small crusted areas We have been unable to follow him further The fifth patient with very extensive lesions and pulmonary tuberculosis received 1 Gm daily for ten days The granulomatous lesions improved considerably and healing still continues

Infectious Eczematoid Dermatitis.—Calloway reported a patient with eczematoid dermatitis of the external auditory canal due to Pseudomonas aeruginosa (previously known as Bacillus pyocyaneus) who had received all forms of therapy for over a year with no improvement.[16] The lesions responded favorably in several days after instillations and sponging with a solution of streptomycin (2 500 units per cc) Repeated cultures became negative with complete healing in ten days

Sutton has treated similar infectious dermatitis of the ear (due to P aeruginosa) with good results.[17] He uses 10 000 units per cc of an aqueous solution

Sulzberger and Baer in discussing Calloway's report state that they also have obtained 'very satisfactory' results with topical application of streptomycin in P aeruginosa infections in this location.[18] They incidentally noted that pathogenic fungi were rarely found in the cases of otitis

externa so prevalent among servicemen in the South Pacific, but that P aeruginosa was present in a substantial proportion "

Leprosy—Faget and Erickson report on ten patients who received a four-month course of streptomycin, 2 Gm daily [19] Beneficial effects could not be demonstrated conclusively, but encouraging changes seem to have occurred in some patients The writers were of the opinion that, unless toxicity is reduced, streptomycin will not become the treatment of choice Five patients treated with sulfones and streptomycin responded better than those treated with streptomycin alone

Dreisbach at the Fifth International Congress of Leprosy recommended the use of streptomycin in the acute lepra reaction [20] Carpenter and his group at the same Congress reported on the use of streptomycin in murine leprosy [21] This closely resembles human infection They found that it suppressed the lesions in advanced murine leprosy and lengthened the average survival time by one and four-tenths months

Lymphogranuloma Venereum—We have treated one man with inguinal lymphadenopathy including matted nodes along the iliac vessels He received 2 Gm daily for seven days, at which time therapy was discontinued because of a marked febrile reaction and intensely pruritic rash He showed no improvement but responded subsequently to sulfadiazine

Perifolliculitis Capitis Abscedens et Suffodiens—We have treated two cases Both, on bacteriologic study, showed a predominance of hemolytic and nonhemolytic Staphylococcus aureus which proved penicillin-resistant and streptomycin-sensitive The first patient received 2 Gm daily for twenty-eight days, but new lesions continued to appear during and after completion of the course The second patient received 2 Gm daily for twenty-four days, combined with sulfadiazine and surgery (exteriorization of cystic lesions and establishing drainage) He showed definite improvement The scalp is now well healed but occasionally shows pustule formation

Rhinoscleroma—McHugh has reported temporary improvement in a case of rhinoscleroma treated with 15 Gm of streptomycin [22] Cultures became sterile but within three weeks were positive again

Syphilis—Fisken and Gruhzit have treated experimental syphilis in rabbits [23] They find that the virulence of Treponema pallidum is not affected by streptomycin

Kolmer's group doing similar research found some improvement followed by relapse in three out of six infected rabbits [24] Clinical reports are sparse, but, in general, indicate streptomycin is of no special value in any stage of human syphilis

Cutaneous Tuberculosis—Most studies have been on draining tuberculous sinuses, and only a few reports are available in other types of tuberculodermas We will consolidate all cases from the literature under each form of cutaneous tuberculosis

1 Tuberculosis colliquativa—O'Leary presented five cases of scrofuloderma with treatment varying from 21 5 Gm in five weeks to 85 5 Gm in eighty-one days [25] He found that ulcerations and sinuses responded well and that larger doses (2 Gm daily) with a longer course were more valuable He feels that of the various conditions treated ulcerations and sinuses responded most satisfactorily

In the Veterans Administration, Army and Navy, reports to the Council on Pharmacy, 90 patients with draining cutaneous sinuses and lymphadenitis were reviewed [6] The dosage at first was 1 8 Gm , then 2 Gm daily for one hundred twenty days It was found that 80 per cent of the sinuses healed within ninety days and that healing was accelerated if underlying suppurating foci were evacuated The consensus is that the effect of streptomycin on tuberculous sinuses is strikingly favorable and sufficiently uniform to establish its usefulness Its effect on nondraining nodes was variable In some instances a definite and prompt reduction in size was visible, in others there was little or no change

We have treated two cases of scrofuloderma The first patient was given 2 Gm daily for one hundred ten days He showed healing of the cervical sinuses and reduction in size of the glands Many tuberculous gummas on his trunk also responded favorably, and no new lesions developed The second patient received 2 Gm daily for fifty-five days He was a diabetic with a complicating acne conglobata There was a suppurating tuberculous adenitis Healing of the tuberculous lesion followed promptly but not of the acne conglobata Five cases of cervical lymphadenitis without sinuses responded well under the same regimen of 2 Gm daily, the nodes becoming small and hard with disappearance of inflammatory reaction, although they are still palpable

The annual report of the Committee on Therapy of the American Medical Association recommends streptomycin for draining tuberculous sinuses and considers it highly effective in a large majority of cases [26] The dosage suggested is 1 to 2 Gm daily in divided doses every four to six hours for three to four months However, its values in other types of cutaneous tuberculosis and tuberculous lymphadenitis without sinus formation is yet to be determined

2 Lupus vulgaris—O'Leary reported two

cases.[25] One patient received 115 Gm. of streptomycin in one hundred seventeen days, with healing of the ulcerative process and considerable involution of the infiltration. However, subsequent biopsy revealed typical tubercle formation and latent activity. The second patient received 18 Gm. in twenty-four days with no change. This was considered inadequate therapy. O'Leary concluded that early primary infections such as the inoculation type of tuberculosis probably respond better than long-standing, organized processes.

3. Tuberculosis verrucosa cutis.—We have treated one case with 1 Gm. daily for six weeks. The lesions healed completely with no evidence of relapse after two months.

4. Tuberculosis miliaris disseminata faciei.—O'Leary treated one patient with three courses of streptomycin in six months, totaling 100 Gm.[25] There was no significant lasting improvement, but there were temporary remissions after each course.

We have treated one patient with 2 Gm. daily for a month. There was only slight temporary improvement.

5. Tuberculosis orificialis.—We have treated one patient with 1 Gm. daily for a month. There was good response with rapid complete healing of *the ulcer, which was located on the tongue*.

O'Leary believes that streptomycin should be fortified with calciferol in the treatment of lupus vulgaris and other forms of cutaneous tuberculosis and tuberculids.[27]

Tularemia.—The effectiveness of streptomycin in this condition was recognized early. In 1946 the National Research Council reported on 67 cases with 63 recoveries.[4,5] The average dose was 1 Gm. daily for seven days. Subsequently, the Council on Pharmacy reported that "Pasteurella tularensis is highly susceptible to streptomycin, and this agent is the most effective treatment for tularemia available at present."[28]

Pulaski and Amspacher described ten cases treated in the U.S. Army hospitals with good results.[29] Doses were 2 Gm. daily from seven to fourteen days. Johnson's group treated five patients who responded favorably to an average of 4.4 Gm. administered over seven days.[30]

Benson and Harwell report on 56 patients treated in 22 Veterans Administration hospitals.[31] Dosages varied considerably but averaged about 8 gm. in nine days. If streptomycin was started after the twelfth day of illness there was little effect on the suppurative lymphadenopathy even though striking improvement was visible in other manifestations.

Toxicity

The report prepared by the Veterans Administration, Army and Navy, the Report of the Committee on Therapy, and the article by Farrington and his associates summarize fairly well our knowledge of the toxicity of streptomycin.[6,25,32] For our purpose we will divide these toxic reactions into systemic and cutaneous.

Systemic.

1. Histamine-like reaction.—This is no longer detectable in the currently available purified product.

2. Local irritation at the site of injection.—Also disappearing with purified preparations.

3. Renal irritation.—Casts and albumin are seen often. However serious renal damage is rarely observed unless there is pre-existing renal disease.

4. Blood dyscrasias.—These are rare but mild leukopenia and agranulocytosis have been reported. Recently, two cases of aplastic anemia occurred at the Fitzsimmons General Hospital. All blood dyscrasias have appeared only after many weeks of therapy.

5. Eosinophilia.—In the majority of patients, at some time during the course of therapy eosinophilia varying from 5 to 30 per cent has been observed.

6. Vertigo.—Vestibular dysfunction has been reported about the fourth week of continuous *therapy. However, there is usually complete* symptomatic recovery by compensatory mechanisms and not by restoration of labyrinthine function.

7. Deafness.—This will be produced rarely and only following large doses or when streptomycin excretion is defective. Useful hearing is usually regained if treatment is suspended promptly.

Cutaneous

1. Eruptions following injections.—There may be a pruritic *erythematous, maculopapular* eruption having its onset within the first ten days of therapy. The pruritus is usually relieved by antihistaminics; the eruption itself disappearing in three to seven days. Therapy does not have to be interrupted. It is sometimes accompanied by fever. Steiner and Fishburn report a 20 per cent incidence in 33 cases.[33]

The Veterans Administration, Army and Navy report seven cases of exfoliative dermatitis (0.80 per cent) in which streptomycin had to be discontinued.[6]

In our cases the early rash was maculopapular morbilliform, scarlatiniform and frequently non pruritic. Our incidence has been 16.6 per cent (five out of 30 who had received a course of one hundred twenty days therapy). This rash did not seem to be related to exfoliative dermatitis which we have seen in two patients. In both of these it appeared after two months of therapy

which had to be stopped on the sixty-seventh and seventy-sixth days, respectively One had also presented an early rash which had disappeared spontaneously, while the second had had no early rash This early rash and the exfoliative dermatitis seem to have the same relationship as the ninth day erythema of Milian and the exfoliative dermatitis seen following arsenical therapy

2 Dermatitis Venenata —This has been observed among personnel handling the drug It has been reported by Strauss and Warring, Rauchweiger *et al*, and ourselves [34-36] We have now seen seven nurses with this type of dermatitis Its location is usually on the hands and around the eyes It has appeared only in those who are in daily contact with the drug over a protracted period It appeared in one nurse after two months of service on streptomycin wards It has not been observed among nurses working on wards where streptomycin is used only occasionally One nurse has had to transfer to a section where no streptomycin is used because of extreme sensitivity to the mere presence of the drug in the room Desensitization of this case was unsuccessful Another has shown "hardening," the eruption appearing after prolonged vacation on several occasions and disappearing after several weeks work with the drug The other nurses have been able to protect themselves by working with gloves This has become a sufficient problem so that we now advise all personnel who handle streptomycin routinely to wear gloves

We are now pursuing further studies with prophetic patch tests and direct application of a carbowax ointment in an attempt to determine the sensitizing index of streptomycin used therapeutically as an ointment

Summary and Conclusions

1 Streptomycin is the antibiotic of choice in granuloma inguinale, tularemia, and cutaneous infections due to Pseudomonas aeruginosa (B pyocyaneus)

2 It is of definite value in tuberculosis colliquativa, tuberculosis orificialis, chancroid, gonorrheal infections, infectious eczematoid dermatitis, and in cutaneous infections where other antibiotics have failed or where the patient presents an idiosyncrasy

3 It may benefit other forms of cutaneous tuberculosis, rhinoscleroma, and leprosy Further clinical investigation in these diseases is recommended

4 Systemic toxic reactions are not rare and may be serious but usually appear after weeks of therapy Vertigo due to labyrinthine disturbances is not uncommon and may be annoying and permanent

5 Cutaneous reactions are of three types (*a*) An early polymorphous biotropic type of exanthema appearing before the tenth day which responds to antihistaminics and does not require cessation of therapy, (*b*) an exfoliative dermatitis, appearing after many weeks of therapy necessitating cessation of therapy, and (*c*) a troublesome contact dermatitis of high incidence, especially in nurses continually in contact with the drug over long periods which necessitates either the wearing of rubber gloves, frequent rotation of nurses, or removal from further contact

References

1 Schatz, A Bugie, E and Waksman S A Proc Soc Exper Biol. & Med 55 66 (Jan.) 1944
2 Feldman W A and Hinshaw H C Proc Staff Meet. Mayo Clinic 19 593 (Dec 27) 1944
3 Hinshaw H C and Feldman, W H *ibid* 20 313 (Sept. 5) 1945
4 Keefer C S Chairman, National Research Council Committee on Chemotherapeutics and Other Agents J A M A 132 4 (Sept 7) 1946
5 *Ibid* 132 70 (Sept 14) 1946
6 Report to the Council on Pharmacy and Chemistry of the A M A by the Veterans Administration Army and Navy *ibid* 135 634 (Nov 8) 1947
7 Gold H McDermott, W *et al* Am. J Med 4 130 (Jan) 1948
8 Mortara F and Saito M T Am. J Syph , Gonor & Ven. Dis 31 20 (Jan.) 1947
9 Hirsh H L and Taggart S R. J Ven Dis Inform 29 47 (Feb) 1948
10 Klauder, J V and Rule Anna M J Invest. Dermat. 7 329 (Dec) 1946
11 Woodbine M Quart Rev Dermat & Syph (abstracted) 2 533 (Dec) 1947
12 Pulaski E J J Ven Dis Inform 28 1 (Jan.) 1947
13 Chinn B D Putnam L E , Taggart S R., and Herwick R. P Am J Syph Gonor & Ven. Dis 31 268 (May) 1947
14 Barton R L , Craig M R Schwemlein G X., and Bauer, T J Arch Dermat. & Syph. 56 1 (July) 1947
15 Greenblatt R. B Dienst R. B Kupperman, H S and Reinstein C R. J Ven Dis Inform 28 183 (Sept.) 1947
16 Calloway J L Arch Dermat & Syph 55 257 (Feb) 1947
17 Sutton R L Jr Personal Communication
18 Sulzberger, M B and Baer R. L The 1947 Year Book of Dermatology and Syphilology Chicago The Year Book Publishers, 1948 p 50
19 Faget G H , and Erickson P T Internat J Leprosy 15 146 (Apr -June) 1947
20 Dreisbach J A Reported at 5th Internat Congress Leprosy Havana, Apr 5 1948
21 Carpenter C Stokinger H E Ackerman H and Surland L G 5th Internat. Congress Leprosy, Havana Apr 5 1948
22 McHugh H E Arch Dermat. & Syph To be published
23 Fisher R A and Gruhzit O M Am. J Syph Gonor & Ven Dis 30 581 (Nov) 1946
24 Kolmer J A Rule A M and Paul A J Proc Soc. Exper Biol & Med 63 242 (Nov) 1946
25 O Leary, P A Ceder L T Hinshaw H C , and Feldman W H Arch. Dermat. & Syph 55 222 (Feb) 1947
26 Annual Report of the Committee on Therapy and the Subcommittee on Streptomycin J A M A 135 641 (Nov 8) 1947
27 O Leary P A Personal Communication
28 Report of the Council on Pharmacy and Chemistry *ibid* 133 320 (Feb 1) 1947
29 Pulaski E J and Amspacher W H Am J M Sc 214 144 (Aug) 1947
30 Johnson, J B Wilkinson C B and Figueras, E. *ibid* 214 645 (Dec) 1947
31 Berson R C and Harwell A B *ibid* 215 243 (Mar) 1948
32 Farrington, R F , Hull-Smith H Bunn P A and McDermott, W *ibid* 134 670 (June 21) 1947
33 Steiner K. and Fishburn C W Arch Dermat. & Syph 56 511 (Oct) 1947
34 Strauss J M and Warring F C J Invest Dermat 9 99 (Aug) 1947
35 Canizares O and Shatin H Arch Dermat & Syph. 56 676 (Nov) 1947
36 Rauchweiger S M , Erskine F A and Nalla, W L. J A M A 136 614 (Feb 28) 1948

TEETH AND SKIN DISEASES

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FROM infancy to old age the teeth have a role in skin diseases. Even the edentulous old man with full upper and lower plates may have eczema from a retained root fragment about which there is infection or from pressure necrosis of the gingivo-buccal mucosa from the dentures

These troubles may be chronologically listed as follows

1 Infantile eczema produced or exaggerated by deciduous teeth

2 Alopecia areata in children, five years of age and up, from teething and impactions

3 Pustular rosacea, sycosis vulgaris, pustular bacterid, eczema, dental fistula, or recurrent furunculosis from abscessed teeth, mostly in middle-aged people

4 Eczema of the legs, spreading to other parts of the body, from abscessed teeth in elderly people.

5 Miscellaneous dermatoses, such as chronic urticaria, lupus erythematosus, erythema multiforme, erythema nodosum, purpura, pemphigus etc., in which focal infection may be a factor

Statistics

Charts of 15,225 patients in our private practice were examined Of these, there were 286 cases of skin diseases, exclusive of alopecia areata, probably due to focal infections of the teeth, tonsils, or sinuses. Of these, 78 cases were selected for the basis of this paper Only two cases have been reported previously [1] This selection was made on completeness of data and thoroughness of study Forty five cases were cured permanently and completely by the removal of foci of infection This is 58 per cent that are known to be cured Many others probably were cured but want of a definite statement to that effect excluded them Of the 45 cases known to be cured there were 22 pustular bacterids, of which 12 were due to infected tonsils, nine to abscessed teeth and one was caused by a rectal fistula. There were 17 cases of eczema of the legs, all caused by abscessed teeth There were three cases of pustular rosacea, two of which were cured by removal of teeth and one by tonsillectomy There were two cases of chronic urticaria, both cured by extraction of abscessed teeth, and one case of eczema of the face, cured by removal of teeth.

Other cases not included in the cured list are three of pustular bacterid and one of chronic urticaria in persons with polypoid pansinusitis, and one case of pustular bacterid in an elderly woman who had diseased tonsils, a white blood count of 12,500, and pathogens on tonsil cultures, and whose eruption cleared repeatedly after she was given sulfadiazine by mouth We also did not include patients who answered the questionnaire indefinitely with, "Since having my tonsils removed one year ago, the skin condition on my fingers has improved 50 to 75 per cent though not completely cured "

Infantile Eczema

Although intensive studies have elucidated some problems of this disease, our knowledge is still fragmentary Each case is a separate problem and too often a baffling one However most doctors who have had experience in infantile eczema agree that teething may exaggerate the eczema and that there are cases of eczema that occur in children eighteen to thirty months of age which only disappear after dentition is over Holt and McIntosh state, "In cases of eczema the symptoms often undergo a distinct exacerbation with the eruption of each group of teeth "[1]

Rosacea

Feit, Laslo, and Vero in 1935 first interpreted rosacea as a bacterid from focal infection [2] A clinical experience started their study It is worthwhile to give their description ' A woman with a pustular eruption of the face of several years' duration consulted us The eruption resembled iodide acne " There was no improvement from local treatment, but she returned a few months later completely cured, attributing her cure to the draining of a maxillary empyema caused by an infected tooth The recovery of this patient was so dramatic that the doctors decided to study the question of focal infection in rosacea In a series of 50 patients with rosacea they found definite focal infections in 43 cases and of these 78 per cent were either completely cured or improved by removal of the foci [2]

We have had several cases of this type and the following is an example

Case 1 —L B a man aged 71 consulted us in October, 1941 because of pustular rosacea of the nose and cheeks of five years duration He had been treated previously with sulfonamide ointment which helped temporarily His teeth had not been checked in many years Examination revealed that

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he only had a few remaining teeth, which looked carious There was gingivitis Radiographs of the teeth showed four root abscesses All the remaining teeth were extracted on December 3 Three weeks later the skin eruption was entirely gone, and it has never recurred

Pustular Bacterids

Pustular bacterids of the hands and feet are chronic recalcitrant vesicular and pustular eruptions, symmetrically located on palms and soles, which during quiescent periods become dry, erythematous, exfoliative patches The course is characterized by repeated exacerbations, during which groups of vesicles of pustules break out over the involved areas with severe itching and sometimes swelling and pain From day to day, fresh groups of lesions may appear, and in some cases vesiculation is pronounced, whereas in others the lesions are almost entirely pustular from the onset In still others, the early vesicles become pustules in the course of time Gradually the number of new lesions diminishes and the condition temporarily subsides to a quiescent stage, in which the involved areas are diffusely erythematous, dry, shiny, and exfoliative

The condition has a direct relationship to focal infections Cures result when the focal infection is identified and removed In many cases in which cures have been achieved, the tonsils were diseased and tonsillectomy was followed within a few months by a complete cure In other cases, abscessed teeth, cholecystitis, chronic pyelitis, and other sources of infection were the cause of the trouble

A leukocytosis is present in many cases Frequently the counts are 10,000 or more, and occasionally they are much higher In two cases the leukocyte counts were over 19,000, and in several instances have been as high as 14,000 and 16,000 This does not mean that a leukocytosis is present in all cases at all times Apparently it develops at the time of an exacerbation

Cultures of material from the lesions are often sterile

Positive cutaneous reactions are obtained to staphylococcus and streptococcus extracts It is difficult to estimate whether or not this is important, but perhaps it has slight significance We are not impressed by the reliability of such tests

The histologic picture shows pustules deep in the epidermis, with hardly any inflammatory reaction about them and without much acanthosis and parakeratosis The microscopic changes resemble those seen in some cases of trichophytids

Barber has acknowledged the term "pustular bacterid" presenting cases of this condition, and has sent us excellent photographs of cases in which he has made the diagnosis of pustular bacterid He believes pustular bacterid is more vesicular and more eczematoid than pustular psoriasis,[2] from which he can differentiate it Certainly the typical case of pustular bacterid has no semblance to psoriasis vulgaris, clinically or histologically

The occurrence of similar eruptions in patients who have psoriasis is debatable The histologic changes in such cases have been interpreted variously In 1936 MacKee and Foster, with the assistance of Satenstein and Fraser, showed that the histologic changes of aberrant lesions in a group of 20 cases of so-called pustular psoriasis of the extremities were eczematous [3] Satenstein held the view that pustular psoriasis was a misnomer and that the histologic picture in these cases was one of chronic eczema and not psoriasis In 1945 Sachs and Scannone showed that the majority of cases of so-called pustular psoriasis were not related to psoriasis [4] They found no relationship between the Munro abscess of psoriasis and the pustule of the so-called pustular psoriasis Nor did they consider the latter to be an exaggeration of the former

In 1947 Sachs, MacKee, and Rothstein reported 11 additional cases of so-called pustular psoriasis [5] They found no evidence of psoriasis, either clinically or microscopically, in any of these cases, and only one had a family history of psoriasis Their histologic findings were exactly the same as those of Machacek in the series of 15 cases, of recalcitrant eruptions of the palms and soles, reported by Andrews, Birkman, and Kelly in 1934 [6,7]

Those cases were later designated as pustular bacterids by Andrews and Machacek, who stated, "The abscesses are deeply situated in the epidermis and are not superficial like Munro abscesses The presence and even decreased thickness of the granular layer in most of our cases and the very slight and inconstant parakeratosis were not in accordance with psoriasis The paucity or complete absence of inflammatory changes outside the pustules were against psoriasis The amount of acanthosis, parakeratosis, and elongation of the papillae in the biopsy specimens from our patients was no more than observed in other diseases, such as eczema, dyshidrosis, and palmar trichophytosis In other words, the histologic changes are far from being pathonomonic for psoriasis and are in general not like those of psoriasis "[6]

That a large portion of these cases are associated with focal infections and are cured by the removal of these infections has been demonstrated over and over again for many years The term, pustular bacterids, first used in 1935, has withstood the test of time and is applied more and

more to such eruptions, as the cause is more carefully studied in tonsil cultures and aspirations, full dental radiographs and vitality tests, trial doses of sulfonamides or injections of penicillin, sensitivity to autogenous vaccines or staphylococcus or streptococcus toxoid, and in oft-repeated white blood cell and differential counts

Case Reports

Case 2—G L, a man aged 50, from Quebec consulted us in April 1947 because of an eruption that had begun the preceding November It started on the soles and heels then spread to the palms He had been treated for dermatophytosis by several dermatologists, but no microscopic examinations had ever been made The patches were vesicopustular and rather symmetrical. We could not find any fungi He had several dead teeth and one broken tooth. The white blood cell count showed 18 000 cells. The differential count was polymorphonuclears 82 per cent (mature 77 per cent, immature 5 per cent) lymphocytes 15 per cent eosinophils 1 per cent, monocytes 2 per cent An injection of 200,000 units of penicillin intramuscularly caused improvement overnight We later received a letter from the patient saying that the eruption had cleared completely a month after the removal of his teeth

Case 3—I T a woman aged 21 consulted us in September 1947 because of an eruption which began on the palms after the birth of a baby nine months previously There was no history of psoriasis in the patient or her family On both palms especially over the thenar and hypothenar eminences, there was an erythematous pustular exfoliative eruption (Fig 1) The pustules were mostly at the edges of the scaly patches although some were distributed in the patches Some pustules had dried leaving brownish spots The fingernails were eroded and broken off and some were very loose (Fig 2) On the heels there were patches of scaly vesicopustular character Also on the lateral aspect of the left forefoot and little toe was a similar scaly pustular patch. Direct examinations for fungi from the palms, nails and soles were negative Cultures were made for fungi

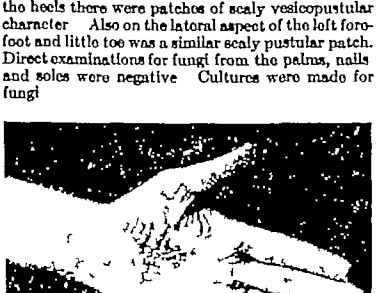


FIG 1 Pustular bacterid. The patient had pustulo-follicular exfoliated patches, of nine months duration on both palms. The eruption cleared up after a tonsillectomy (Case 3)



FIG 2 Distrophic nail changes with no fungi present The nails also became normal after tonsillectomy (Case 3)

The teeth appeared in good condition and her dentist verified this fact The tonsils were very large red and almost met in the midline the tonsillar crypts were filled with pus. The white blood count was 12 500 The tonsils were removed and Dr Peter S Lerner wrote to us in November, 1947,

Under separate cover I am mailing you the pictures of Mrs T's hands I am told that they have improved remarkably since tonsillectomy "[6] Later he reported by telephone that the hands were entirely well, and recent inquiry shows that they have remained cured.

Case 4—L W, a woman aged 39 consulted us in March 1946 with a pustular eruption of two weeks' duration. The patient was scarcely able to walk because of profuse aggregations of small pustules and pustulovesicles on both soles. She had a low-grade fever, and her leukocyte count was 18,000 Examination for fungi was negative Blood sugar was 115 mg per 100 cc. Penicillin was administered without improvement. Roentgenograms of the teeth showed three that might have been infected, but there was not enough evidence of focal infection to warrant extraction

There was a history of severe sinusitis ten years previously The patient also had had seasonal hay fever due to ragweed She had shown intolerance to sulfonamides

The tonsils were small deeply imbedded with marked adhesions of both capsules. The tonsils were aspirated on May 29 and a considerable amount of pus was obtained from them. The condition of the hands and feet improved the following day On June 1 the tonsils were removed surgically Soon afterwards there was marked improvement of the skin condition which by fall had entirely healed and has remained so without any other treatment

Case 5—W F D a woman aged 33 refused to have her tonsils removed but later developed acute otitis media. After recovery her physician insisted that the tonsils be removed A tonsillectomy was performed in 1930 The pustular eruption on the heels and palms which had been present for three and a half years and had resisted all treatment disappeared within two months after the tonsillectomy and has never recurred.

Eczema

In addition to the pustulovesicular eruptions characteristic of pustular bacterid, we have encountered a large number of vesicular and eczematoid patchy eruptions on the fingers, toes, heels, and dorsal aspects of the hands, as well as on the palms and soles, which belong in the same category Occasionally such eruptions are rather diffuse and exudative, so that they are mistaken for contact dermatitis They may be predominantly exfoliative and vesicular, with alternate periods of quiescence and activity These may have the appearance of fungus infections and be treated as such for years

There is also a distinct entity which we call dental eczema (Fig 3) It occurs on the legs of older people and is due to abscessed teeth Most of the patients are men Such cases usually begin as vesicular or crusted pruritic patches on one or both legs just above the ankle, or on the sides of the ankle or foot The eruption spreads next to the dorsa of the hands or forearms, and then may affect the ear or become widespread The affected skin is invariably excoriated and erythematous, sometimes exudative, like contact dermatitis, and at other times lichenified and crusted The leukocyte count may or may not be elevated, ranging from normal to 20,000 This type of eczema due to bacterial sensitization is so common in middle-aged and older people, who usually have no history of previous skin trouble or of any allergic condition, that the syndrome is an entity Over and over again this suspicion is verified by the dentist, and the skin condition is cured by extraction

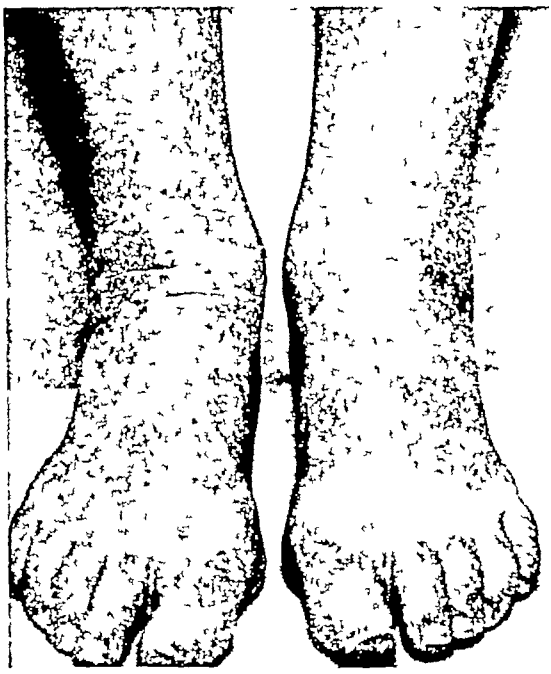


Fig 3 Dental eczema of ten years' duration The upper teeth of the patient had been injured by football playing, so that he had four nonvital abscessed teeth, bad bone absorption, and decay All the infected upper teeth were extracted, and the eczema cleared

Case 6 —W A D , a man aged 72, was first seen at the New York Hospital in 1945 He had a widespread erythematous, eczematous eruption, with the legs especially edematous The history showed that ten years previously 17 abscessed teeth had been removed The remaining teeth were apparently diseased His dentist, when questioned, said the patient had several dead and infected teeth for which he had advised extraction Four months later, in February, 1946, the remaining abscessed teeth were extracted There was immediate improvement in the skin condition, and by April the skin was entirely normal He has remained free from eczema ever since and at the age of 75 designed the famous balcony for the White House in Washington, D C

Miscellaneous Dermatoses

Sycosis vulgaris is often secondary to a focus of infection in the paranasal sinuses or in the teeth or tonsils Abscessed teeth may cause chronic urticaria, or cheilitis, or influence the course of lupus erythematosus, erythema multiforme, erythema nodosum, pemphigus, and other skin diseases

Alopecia Areata

Nineteen centuries ago Celsus described alopecia areata From that time until the present day this disease has been ascribed to many different causes

The first clinical work reported was that of Bateman in 1829 [15] The rapid strides in medicine during the latter half of the nineteenth century, following the new vistas opened by Pasteur, brought about the theory of a parasite as the causative agent In 1887 a commission appointed by the Paris Academy of Medicine announced that alopecia areata was contagious, however, the causative parasite could not be found After years of work Sabouraud announced in 1900 that the parasitic theory was the only acceptable cause [16]

During the latter half of the nineteenth century another theory was proposed by Barensprung, who believed that alopecia areata was a neurotrophic disorder [17] This belief was further stimulated by the experiments of Joseph, in 1886, who sectioned the posterior root of the second cervical nerve distally to the ganglion in cats and dogs [18] This produced a lesion similar to that of alopecia areata in man

The twentieth century ushered in a new etiologic theory known as the dystrophic theory of Jacquet [10] Later the endocrine theory gained favor among the many students of this subject

These four theories—the parasitic, neurotrophic, dystrophic, and the endocrinic—have had their faithful adherents The parasitic theory was finally and definitely rescinded by Sabouraud himself in 1913 The neurotrophic theory, affirmed by Joseph in 1886 has been entirely discredited in recent times by the work of Wright (1920), who showed that cutting the posterior root of the second cervical nerve in man, cutting the sensory nerves which supply the scalp, and cutting the entire supply of the sympathetic nervous system to the scalp are without influence on the hair [11] Subsequently, Auburn in 1932 in a series of 118 operations on the cervical nerves, also disproved this theory [12]

The endocrine theory, with the influence of the glands on the nervous system both in the mental and physical sphere has been a major factor in explaining the cause of alopecia areata Disturbances in the functions of the thyroid, pituitary, and sex glands are most frequently mentioned However, Waisman and Kepler, at the Mayo Clinic, in a study of 138 cases of alopecia areata concluded that there was no gross clinical evidence consistent with functional abnormality of internal secretions.[13]

The dystrophic theory of Jacquet concerned itself mainly with the teeth. He maintained that *alopecia areata was not an entity but a symptom* of diverse and banal conditions He attempted to show that dental pathology was possibly the most important factor in causing reflex irritations and producing alopecia areata. Gingivitis, periodontal inflammation, pyorrhea abscessed teeth, abnormal evolution of teeth, and impactions were included in his definition of dental pathology [10]

An interesting finding was the fact that usually the pathology of the teeth was ipsilateral with the alopecia areata His studies in the localization of alopecia areata led him to believe that there were predisposed zones (peladophores) of the scalp and beard where alopecia areata was most frequent as a result of reflex irritation The most frequent sites of expression were the mastoid, lateral mental, and the nuchal regions The frequency of these regions, according to Jacquet, corresponded to the most highly innervated regions of the integument of the scalp [12]

Jacquet lived before the days of dental radiographs and anesthesia At that period it was difficult to tell whether a tooth was impacted or infected except by probing or by extracting it. Sometimes a rather crude and vigorous approach was employed in order to prove Jacquet's hypothesis With the exception of a report in 1942 by Grace, attributing one case of extensive alopecia caused by teeth, the medical literature has been devoid in recent times of further investigations of Jacquet's theory, despite the obvious advantages afforded by modern-day dental x ray technic [14]

It is for this reason that we have assembled from private practice 58 cases of alopecia areata in which dental pathology was noted Satisfactory full mouth x rays were obtained in 24 of the 58 cases Of these 22 (90 per cent) had definite dental pathology, 13 of the 22 (53 per cent) had impactions On visual examination where x rays were not obtainable, there were 25 cases (74 per cent) of the 34 with definite pathology of the teeth, eight of the 25 (32 per cent) had impactions Impactions, root fragments abscessed teeth, severe alveolar retraction and multiple devitalized teeth with caries were considered as pathologic conditions Simple caries were not considered These must be explained by the theory of reflex nerve irritation This is one of the vague physiologic theories which no one can completely prove or disprove We can only offer our material and let you judge for yourselves

Case Report

Case 7—S G a woman aged 17 in January, 1946 had a small area of alopecia develop on the occipital area of the scalp When she was first seen by us in March, 1948, defluvium had progressed to an extensive irregular area covering the entire back of the scalp, measuring 15 by 15 cm., and to an irregularly band-spaced patch on the left frontal and parietal region measuring 5 by 12 cm She had a minimal amount of hair on the rest of her body, none on her arms and legs and sparsity in the pubic and axillary areas. Previous treatment had consisted of 100 000 units of vitamin A daily, estrogenic therapy thyroid extract, intramuscular crude liver extract, and applications of local ultraviolet light and phenol

At the age of eight she had chorea, from which she recovered with no residual defects She had no other pertinent medical history

Physical examination showed no abnormalities. Her tonsils were out and the teeth were in an excellent state of repair however only one wisdom tooth was erupted, which was not unusual at her age Nevertheless a full mouth x ray was advised Herewith is the report of a competent dentist All teeth are vital and free from apical infection She does have, however three unerupted third molars It seems that it would be very difficult for these teeth to erupt in their proper position as there is not room enough in the lower jaw for the right lower third molar to come through completely and the upper two teeth seem to be caught under the bulge of the second molars. The tissues around the crowns of these teeth always contain a low-grade chronic infection and I believe it would be wise to remove them

Accordingly the three impacted teeth were extracted March 10 1948. Six weeks later hair was growing and eight weeks later all the patches were being rapidly filled in with new hair

Case 8—A. S. a man aged 31, in September 1947, had a bald oval-shaped area of alopecia, 3 cm in its

greatest diameter, developed on the lower right buccal area. General examination showed no gross abnormalities The teeth were in good repair, however, the lower right bicuspids were crossed, with the second bicuspid displaced lingually and anteriorly X-rays confirmed the findings and showed incomplete filling of the two crossed teeth and decay of the lower right molars

Local treatment of phenol and alcohol was performed until January, when extraction of the questionable teeth was started Five weeks after complete extraction of the teeth, there was a complete regrowth of hair in the previous bald patch.

Case 9—D L, a woman aged 21, in June, 1947, developed alopecia on the back of her scalp, about 10 cm in diameter

Tonsils had been removed in childhood Examination of teeth, confirmed by full-mouth x-ray, showed four impacted wisdom teeth which were infected Previous treatment consisted of vitamin A, 50,000 units daily, and ultraviolet light locally In October, 1947, the four impacted wisdom teeth were extracted Three weeks later hair was regrowing in the patch Healthy, normal hair completely regrew, and there has been no recurrence of the alopecia

Summary

A study of the relationship of infected and impacted teeth and infected tonsils to various skin diseases has been made It has been proved justifiably that pustular bacterids of the palms and soles are cured by removal of such foci of infection It has been shown that eczema of the legs in old people is frequently caused by abscessed teeth. The possible connection of dental pathology, especially impaction, with concomitant infection to alopecia areata has been discussed

Discussion

Dr Leslie Paxton Barker, *New York City*—For many years I have been interested in the relationship of foci of infections to cutaneous eruptions These are at times primary, but, more frequently, they are secondary or contributory causes of cutaneous eruptions A commonly overlooked focus of infection is the prostate gland I have seen many recurrent attacks of furunculosis stopped by massage of the prostate gland which relieves pyogenic infection

Also, I have seen many cases of so-called hemostatic dermatitis, in old people with badly infected teeth, improve only after the infected teeth have been removed

Lupus erythematosis does not respond well to treatment in presence of infection While I do not believe foci of infection are the primary causes of lupus erythematosis, they certainly interfere with response to treatment We have all seen cases of chronic urticaria, pustular bacterides, and alopecia areata clear up completely after the removal of the infection The most common of these are the teeth, tonsils, sinuses, prostate gland, and intestinal tract

The relationship of foci of infection and cutaneous eruption further emphasizes the fact that cutaneous disorders are often merely symptoms of internal disorders

Dr Tibor Cholnoky, *New York City*—If focal infection is detected in the mouth, it cannot always be eliminated by simple extraction of the offending teeth, as the infected focus may persist in the jaw as peridental infection If, after extraction of the teeth, improvement does not occur or is only transitory, the patient may be harboring an infection in the alveolar process "Irritation" from the denture, and tenderness or pain of the gum suggest persistent focal infection

X-ray examination may be helpful but is frequently "negative" There may be increased leukocyte count or sedimentation rate, but the cardinal sign is local tenderness Chemotherapy does not seem to improve this condition because of the probable venous stasis The proper treatment of such areas is partial, or, if necessary, total alveolectomy, followed by careful after-treatment as advocated by Siegmund, Fischer, Murray, and Yoder *

Dr Eugene F Traub, *New York City*—It was a privilege to be asked to discuss the paper on focal infection and skin disease by Doctors Andrews and Domonkos, and Miss Hopper They have presented us with an interesting paper on a subject of great practical importance to the patient I am in full accord with the presenter's general viewpoint, except that I believe we have to be somewhat cautious on stating that "cure resulted on removal of the focus" While this is exactly what does happen quite frequently, nevertheless does this indicate definitely that the focus was the cause of the eruption? I believe that it does not indicate causal relationship and should be put down rather as a contributing or background factor It represents a load which the patient is unable to carry and thus throws off through skin eruption When the load is removed, he is able to handle the skin eruption and hence it disappears with minor local treatment

The second point that I would like to bring up is a matter of cross infections An original focus may reside in the teeth, and, after a time, this gives rise to infection in the gastrointestinal tract, the gallbladder, prostate, or other parts of the body Frequently it is necessary not only to remove the seat of the primary infection but the secondary foci as well, and in some instances, when this is not entirely possible, a vaccine made from the organisms of the infection is helpful

Probably we all agree that in the disease called pustular bacterid, foci of infection seem to play a predominantly causative role We have all had too many startling and striking examples of this to admit further doubt On the other hand, there are a number of cases in which the diagnosis apparently was established beyond reasonable doubt in which the removal of infected teeth, tonsils, massage of pros-

* Siegmund H. Beitr z path. Anat. (June) 1929 p 289
Fischer M Death and Dentistry Charles C Thomas Springfield Illinois (1940)
Yoder H. P A Dental Digest (Feb) 1946

tate, and the removal of all other foci still failed to clear up the eruption

I have in mind one particular case that I have followed for a number of years. A man aged 50, G. R., who had a severe, widespread eruption of several years' duration involving the palms and soles. In fact, the eruption was so severe that it was practically impossible for the individual to work. All his teeth were either removed or thoroughly checked and improved. As the eruption did not clear up entirely, however the tonsils were removed with further improvement, and at one time it seemed as though the eruption was about to disappear entirely. However, gradually the lesions returned and further foci were sought. As the prostate was boggy it was massaged and again flare-ups and improvement occurred. No other foci could be found following hospital study, although this of course does not absolutely exclude the possibility. The patient still has an extensive eruption which is only controlled slightly by local treatment. I might say this patient also improved under injections of tartar emetic, local applications of tar and ultraviolet light, etc. but complete recovery has not occurred.

In another case, that of a younger woman the only one I have seen who stated that her hand eruption as well as that on her feet, occurred following an attack of tonsillitis. The eruption was persistent but improved over a period of years. It flared up again however, whenever she had tonsillitis. The eruption fitted into the typical picture of a pustular bacterid, and in this case the removal of her tonsils resulted in a complete cure. In my experience this case was unique in that the skin symptoms definitely followed obvious attacks of tonsillitis.

I would also agree that in infantile eczema teething is undoubtedly a factor. Whether it could be listed as a causative factor however, is open to question. My feeling is that the teeth in such instances—and this is true also in many cases of focal infection—are merely a *contributing factor and not the true* cause of the skin disease.

Rosacea also is a disease in which foci are to be sought. That foci are the sole cause in most cases I doubt very much however anyone carrying a definite focus certainly stands a much better chance of cure on removal of this handicap.

Doctors Andrews and Domonkos report a distinct entity which they call dental eczema, which occurs particularly on the legs of old people especially in old men and is due to abscessed teeth. Undoubtedly old men are apt to have more foci in teeth than younger individuals and hence a higher percentage of infected teeth will be found in such an age range. I would doubt the existence of any specific entity in which simple removal of foci in teeth would regularly clear up eczema on the extremities. I have seen innumerable such patches of eczema in older men and women. It occurs generally between the period of late fall and early spring rarely carrying over through the summer. A high percentage of these patients fall under the heading of winter eczema or winter dermatitis, and are cured by local medication less frequent use of soap and water and protecting and greasing the skin particularly in the fall before the eruption occurs. Doctors Keim and Guy recently reported that such individuals, in their experience had metabolic disturbances and fared better on a high protein intake, but in each case the diet seemed to be a factor that had to be individualized.* In other words, there is no doubt that these cases are common and that a multiplicity of factors prevail, including focal infections in teeth. I would not ascribe to infections in most of these patients more than a minor contributing role.

It is worthwhile, however, to cite a patient, a man who had an extensive eczematous eruption on both forearms. This individual was 42 years of age and had had the eruption for approximately one year. Local treatment brought about temporary but no permanent relief. Foci of infection were sought and three infected teeth were found. Their removal resulted in no change in the local eruption and further foci were sought. On examination the prostate was found to be infected and the organism found was thought to be of dental origin. Following prostatic massage there was an immediate flare-up of the eruption on the arms. This was followed in several days by a distinct improvement. The same sequence of events followed each one of the six succeeding prostatic massages, and at this time the patient's eruption had entirely cleared up and, to my knowledge, he has had no further trouble. I wish to stress this peculiar combination which I have encountered not once but many times—that is a dental infection in teeth followed by an infection of the prostate. A cure of the patient will not result until both foci have been eradicated.

In the case of alopecia areata I can only emphasize what Doctor Andrews has already stated and cite one important case—that of a young girl, 13 years of age, who presented herself with a typical patch of alopecia areata in the center of the scalp. In searching for a focus of infection, we advised her to consult a nose and throat specialist to have her tonsils and sinuses checked. Unfortunately this physician belittled the idea that a focus of infection could cause her hair loss and gave her a rather superficial examination. The mother, not having been satisfied consulted another otolaryngologist who found the right antrum entirely filled with pus. The surprising feature was the extent of the involvement without any symptoms whatsoever pointing to the antrum. On drainage of this focus, the hair gradually returned.

One might regard this cure as a coincidence had it not been for the fact that this same young lady, at the age of 16 returned again with a fresh patch of alopecia areata. She had had no symptoms referrable to her sinuses, but nevertheless the right antrum was again found to be extensively infected. After the antrum was drained and washed the hair again returned. I believe this case can be put down as one in which the relationship between a focus of infection in the sinus and an alopecia areata can be definitely established.

In chronic urticaria, the gallbladder is frequently

* Keim, H. L., and Guy, W. H.: Arch. Dermat. & Syph. To be published.

the site of infection, but this may be secondary to infections either in the teeth or gastrointestinal tract

The last disease that I wish to mention is lupus erythematosis I do not believe that a patient should ever be treated for this disease without a thorough check for foci of infection, and, I believe, also, that it is particularly important to do cultural studies from the various foci and prepare a vaccine if a pathogen can be more or less uniformly found in the various foci While this does not necessarily cure the patient, I believe that, along with other treatment, it frequently makes a final satisfactory outcome

References

1 Holt L E J, and McIntosh R Holt s Diseases of Infancy and Childhood 11th edition D Appleton Century Co New York, 1940 p 358
2 Feit H Lazlo, E A and Vero F J A M A 105 1738 (Nov 30) 1935
3 MacKee G M and Foster P D Arch Dermat & Syph 34 35 (1936)
4 Sachs W and Scannone F J Invest Dermat. 6 349 (Dec) 1945
5 Sachs W MacKee G M and Rothstein M J Arch Dermat & Syph. 56 760 (Dec) 1947
6 Andrews G C and Machacek G F Arch Dermat & Syph 32 837 (Dec.) 1935
7 Andrews, G C, Birkman, F W and Kelly, R J Arch Dermat & Syph 29 548 (April) 1934
8 Lerner Peter S Personal communication (Nov) 1947
9 Galemsky Handbuch der Haut und Geschlects krankheiten 13 253 1932
10 Jacquet L. Annales de Dermat & Syph 4th series 3 180 1902
11 Wright C S. Arch Dermat & Syph 19 365 (Mar) 1929
12 Auburn Enrique Pelada Experimental de Max Joseph Thesis Imprenta Lopez-Peru 666 Buenos Aires 1931
13 Waisman M, and Kepler E J J A M A 116 200 1941
14 Grace J D Arch Dermat. & Syph 45 349 (Feb) 1942
15 Bateman Del Skin Diseases London 1817
16 Sabouraud Rap sur la Pelade au Congress Internationale de Derm. Paris (1900)
17 Barensprung Charite Ann Berlin 8 59 (1858)
18 Joseph M Monatschr f prakt Dermat. 5 483 (1886)

PROTEIN THERAPY UNSUCCESSFUL FOR PEPTIC ULCER, SAY DOCTORS

Protein hydrolysate, predigested protein, is of little value in treating peptic ulcer, five Cleveland, Ohio, doctors report Writing in the August 7 issue of the *Journal of the American Medical Association*, the doctors—Edward E Woldman, David Fishman, Richard S Knowlton, A Ashley Rousuck, and Willard C Stoner—describe their findings from a study made at the department of gastroenterology, St Luke's Hospital, Cleveland

Protein hydrolysate therapy, also known as amino acid diet because the protein is made up of amino acids, is one of the comparatively new treatments for peptic ulcer and one which has been regarded as extremely promising

Developed by Dr Frank Co Tui of the New York University College of Medicine and the New York University Division of Surgery, Bellevue Hospital, New York City, and his associates, it consists of regular feedings of protein hydrolysate and carbohydrates for a period of two or three weeks Supplementary vitamins are also given Many of Dr Co Tui's patients were relieved of pain within twenty-four hours after the treatment was begun Even in "intractable" cases—those who had not improved on complete bed rest and strict Sippy treatment—the ulcers became inactive The alkaline Sippy powders neutralize excess acidity in the stomach and, combined with a mild, soothing diet, have long been used for treating peptic ulcer

Dr Co Tui's theory was that the high caloric and high protein diet rehabilitated the strength and body weight of the ulcer patient as well as prevented overacidity in the stomach Many peptic ulcer patients, Dr Co Tui found, were deficient in protein

Such protein deficiency is brought about by an unbalanced choice of foods rather than by the ulcer patient's inability to retain or digest proteins in ordinary forms, the Cleveland study indicates None of the 22 peptic ulcer patients treated in the study showed protein deficiency To test the therapy, the doctors administered a continuous drip of 10 per cent protein hydrolysate for fourteen days through a tube inserted into the patient's stomach through the nose

Although protein hydrolysate lowers the free acidity as long as the preparation remains in the stomach, they found that its after-effect is to raise the patient's stomach acidity to a higher level than it was before treatment

"When protein hydrolysate leaves the stomach," they say, "there is apparently a stimulation of the production of more free acid to a higher level than the original state The presence of the amino acids in the upper part of the small intestine apparently causes a hormone to be liberated which stimulates the secretion of hydrochloric acid"

Protein hydrolysate also ceases to counteract stomach acidity after being given in repeated small doses, they explain In most of the 22 patients, free hydrochloric acid was observed in the stomach despite the continuous drip of protein hydrolysate Ulcer pain continued for twenty-four to seventy-two hours, and in some patients the pain recurred later during the treatment A month after treatment was discontinued, eight patients had ulcer symptoms again

CONTACT DERMATITIS FROM BEETLES, WITH A REPORT OF A CASE DUE TO THE CARPET BEETLE (ANTHRENUS SCROPHULARIAE)

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(From the Department of Medicine (Dermatology) Cornell University Medical School and the New York Hospital)

A RECENTLY studied patient was found to have a cutaneous disorder characterized by somewhat unusual clinical features On further investigation, the causative agent was found to be the larval form of the common carpet beetle The dermatosis was peculiar in that the reaction was one of hypersensitivity, moreover, a survey of the literature failed to reveal any recorded examples of a similar nature It would seem desirable, then to summarise briefly the historical data, clinical features, and investigative findings in this unique dermatosis

Case Report

Miss A M a graduate nurse forty-seven years of age was seen because of a bizarre type of dermatitis involving mainly the exposed surfaces of the body She had been in good general health until three weeks previously, at which time papulovesicular lesions appeared on the extensor surfaces of the forearms. During the next few days the eruption appeared over the neck the adjacent surfaces of the chest, and to a lesser degree on the anterior aspects of the legs. The eruption became more closely set, especially on the neck, but also on the forearms When first seen it was characterized not only by papulovesicular lesions but by underlying erythema, punctate crusting, some tendency to the development of edema and urtication of individual lesions The general characteristics of the eruption are shown in Fig 1

The condition was accompanied by a great deal of

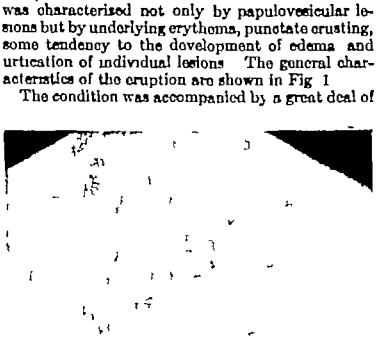


FIG 1 Erythematopapular eruption involving the neck and exposed area of the upper chest.

pruritus which seemed definitely worse when the patient remained for a time in her apartment It was especially severe at night. The eruption was considered initially to be an unusual type of contact dermatitis, and so a complete contact history was taken However, clothing, plant, topical agents, or common airborne contactants could not be identified. The patient then volunteered the information that the entire floor of the apartment house where she lived was infested by an insect. Specimens of the insect were identified by Dr C H Curran entomologist at the American Museum of Natural History in New York, as the larval form of the common carpet beetle Anthrenus scrophulariae L.

Special Studies—Contact studies were done Initially several larvae were ground in a mortar and the resultant mass extracted with normal saline to which a small amount of phenol was added as a preservative Patch tests with this material read after forty-eight hours, were negative

A second experiment was then performed A single larva was decapitated to insure that biting would not occur and was placed with its back in contact with the skin, on the flexor surface of the forearm, from which the previous eruption had completely subsided. Bright red papules appeared around the test site in about four minutes, within the next twenty minutes these papules became more numerous and increased in size some taking on an urticarial cast As the urticarial tendency was developing the older papular lesions on the neck and on other distal sites became urticarial with considerable diffuse redness as well as circumscribed swelling (Fig 2)

Moreover scattered new urticarial papules were seen developing on the neck and forearms. The flare-up continued during the next few hours reaching its height in the evening, with diffuse redness swelling and transformation of some of the urticarial papules into vesicles. The entire course of the exacerbation was accompanied by pruritus the severity of which paralleled the development and course of the new lesions.

In a third experiment several hairs of the larva of the beetle were detached and applied to an area free from dermatitis on the opposite forearm. Satellite papules and a minor distal exacerbation were seen to appear but were less marked and less numerous than in the previous experiment. The difference in reaction may be explained however by the fact that the hairs were applied parallel to the surface of the skin, whereas when the intact larva was placed on the skin the hairs were more numerous with many projecting down on the skin perpendicularly

A control experiment was then performed. Recently decapitated beetle larvae were applied to the flexor surface of the forearms of three normal indi

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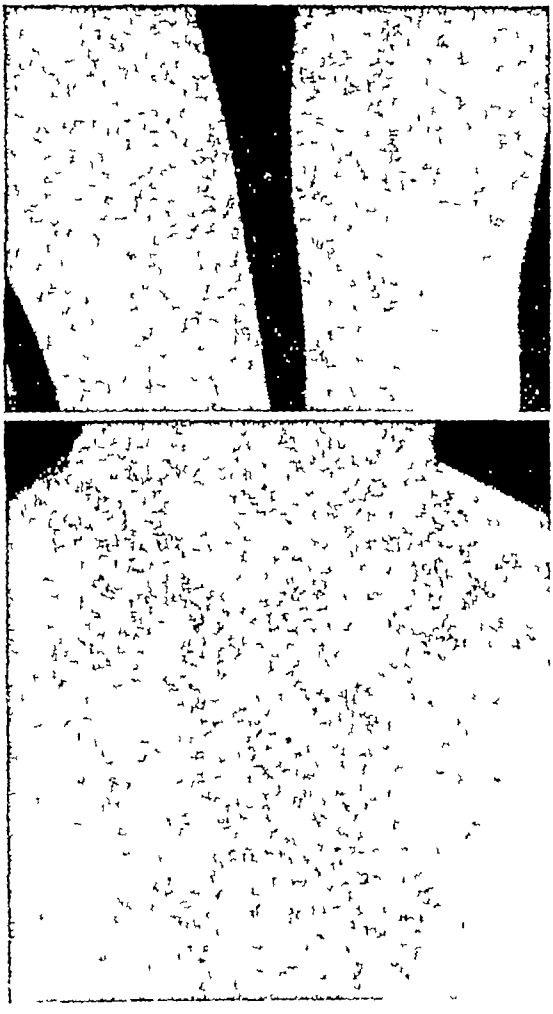


FIG 2 Urticarial papules appeared on the forearms (*A*), and the neck and upper chest (*B*), following a direct application of decapitated beetle larva.

viduals to eliminate the possibility of a uniformly toxic substance in or on the larval hairs No reactions were seen after a thirty-minute exposure

A biopsy was taken of one of the older papular lesions in a covered area on the upper chest The section was studied by Dr Wilbert Sachs, whose report was as follows The epidermis was slightly thickened The vessels of the mid and upper cutis were dilated, and some were filled with blood elements About the vessels was a pronounced cellular infiltration, composed of small round cells, wandering connective tissue cells, and an occasional polymorphonuclear cell In some areas the latter type of cell could be seen in the lumen of the blood vessels The Perl stain was negative, and no important changes were observed with the elastic tissue, Von Giemsa, or methylene blue stains It was felt that the above findings pointed to a mild "toxic" erythema multiforme rather than to a contact dermatitis It was assumed that absorption took place from the original lesions to produce the diffuse eruption in the noncontact areas

Management—Initially, the patient was given soothing lotions and pastes, but after repeated flare-ups occurring during overnight or longer stays in her apartment, the causative agent was identified and attention was directed to its extermination A large wall-to-wall carpet in her apartment was removed and a pressure method of extermination used Subsequently, the eruption following a few minor exacerbations on visits to neighboring apartments, permanently subsided

Life Cycle, Physical Characteristics, and Habits of the Causative Agent

There are two types of common carpet beetles extant in the United States, the first and most ubiquitous being A scrophulariae variously known as the common carpet beetle, the Buffalo bug, or the Buffalo moth [1–6] The second form is the black carpet beetle, or Attagenus piceus, which, while less common than A scrophulariae, is distributed widely throughout the country [1] Two less well-known varieties are the furniture and carpet beetle, Anthrenus vorax, and the varied carpet beetle, Anthrenus verbasci [2]

A scrophulariae in its adult form is a rather handsome beetle about $^3/_{16}$ of an inch long The body has a general background of black, spotted and speckled with white, with a red line down the middle of its back However, the adult beetle is seen only occasionally in temperate climates in the winter months, as it evolutes ordinarily from the larval stage in the late spring and lives only until the fall The adult insect is harmless, lives on plants and flowers, and is not destructive to cloths, rugs, etc Eggs are laid in the fall, and these hatch in about ten days into the larval form

The larvae inhabit warm houses throughout the winter months, grow rapidly, eat voraciously, and molt some six to eight times The larva is reddish-brown in color, of submarine shape, and about $^1/_4$ of an inch in length It is clothed with stiff, long, dark-brown hairs, those at the sides being longer than those on the back, while the hairs at the anterior and posterior end of the larva are longest of all The characteristics of the larva are shown in Fig 3

It is the larval stage of the beetle which causes destruction, holes are eaten in carpets, woolens, furs, cottons, silks, felts, feathers, and even bristles are attacked If food is scarce, the larvae eat their own discarded skins and may resist starvation for as long as ten months In the late spring or early summer the larva emerges into the pupal state, then, after one to three weeks, the adult beetle is formed In its adult form, the beetle lives only four to six weeks In the cooler climates, there is probably but one generation of beetles produced in a year, although at times the cycle may require two years or more In southern states and in warm houses, however, beetles may appear throughout the winter

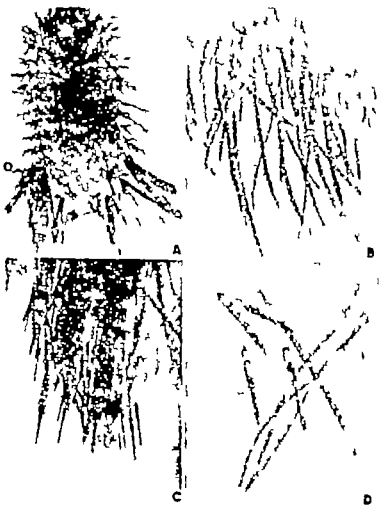


FIG 3. Hairy covering of beetle larva magnified 18 times (*A*) Body hairs of larva magnified 220 times (*B*) The tail tuft of larva hairs, enlarged 155 times showing barblike ends (*C*) Magnified 480 times, the hairs show barbs attached to the end of the hair shaft by a short constricted section (*D*)

Dermatitis from Beetles as Reported in the Literature

A thorough search through the literature, including the *Review of Applied Entomology* failed to reveal a single instance in which larvae of any of the four types of carpet beetle had produced a dermatitis

Various types of adult beetles however, may produce dermatitis in man All these beetles are classified as vesicating or blister beetles and are included under the name of the meloidae or the staphylinidae (rove beetles) [3] Of the rove beetles, Paederus which includes over 200 species is the only genus with vesicating properties The vesicating material is secreted in the reproductive organs and circulates in the blood plasma It is thought by some authorities to be cantharidin or a cantharidin-like substance and invariably produces its characteristic vesicating, effect on contact with human skin [4] The substance is a primary cutaneous irritant rather than a sensitizing material Ordinarily, the eruption develops some hours (up to twenty four) after contact and is characterized by bullae arising from apparently normal skin or by vesicles grouped in rows where the insect traverses the skin [5 7] In severe cases extensive dermatitis fever and debility may be present, as well as involvement of the conjunctivae [7 8]

The second class of insects which have a primary irritating effect on the skin is lepidoptera (moths and butterflies) [9] The larval (caterpillar) form of these insects has a marked netting effect when in contact with the skin, because of a poisonous secretion from cutaneous glands Thus secretion is extruded on or through the hollow center of spinelike processes intermixed with the hairy covering The most common urticating insects are the puss caterpillar and the larval forms of the following moths brown tailed flannel, saddle-back, satin hickory tiger, and buck types [5] The characteristic lesions are urticarial papulovesicular, or bullous and occur chiefly on the areas of contact. The eruption may resemble closely the dermatitis produced by the carpet beetle The puss caterpillar may also give rise to numbness weakness and peripheral paralysis [9]

Comment and Summary

It is evident that the present case is unique in that previous examples of dermatitis caused by beetles have been primarily vesicular or bullous and have been caused by an agent which produces uniformly a dermatitis on contact with the skin of man On the contrary the carpet beetle judging by its widespread habitat in the United States and the absence of recorded reactions has no primarily toxic effect on normal skin The papular urticarial, and vesicular lesions, as seen in the original dermatosis and in the later experimentally produced lesions are due apparently to hypersensitivity to the larval hairs It is believed also that the eruption is caused by local absorption transepidermal penetration and reaction in the vascular bed followed by vascular transportation and distal cutaneous response to the allergenic material

References

1 Herrick G Insects Injurious to the Household Rural Science Series. Macmillan Co. New York 1921 p. 203.
2. Schmitt, J Carpet Beetles New Jersey Agricultural Experiment Stations, Rutgers University New Brunswick New Jersey Circular 406 (June) 1945
3. Duryee W, and Weiss, H. The Dermestid Beetles of New Jersey Including the Carpet Beetles and Those Which Feed on Animal Products. New Jersey Dept Agriculture Bureau of Statistics nd Inspection Trenton, New Jersey Circular 108 (April) 1927 p. 13
4. Riley W and Johannsen O Medical Entomology M Graw Hill Co., New York, 1937 p 16.
5. Matheson, R. Medical Entomology Charles Thoma Baltimore, 1932.
6. Swarts W and Wanamaker J: J A.M.A. 131: 504 (June 15) 1946.
7 Curry D Proc. M A Isthmian Canal Zone 15: 37 (1927)
8. Chopra, R. Indian M Gaz. 69: 23 (Jan.) 1934.
9 Foot N: J Exper Med. 33: 737 (May) 1922.

THE PERMANENT CAMOUFLAGE OF PORT-WINE STAIN OF THE FACE BY INTRADERMAL INJECTION OF INSOLUBLE PIGMENTS (TATTOOING)

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DEVELOPMENTS in the field of plastic surgery have resulted in the fact that increasing numbers of patients seeking obliteration of nevus flammeus (port-wine stain) present themselves for surgery Most probably this is accounted for by the dissatisfaction, expressed generally by patients and physicians, with current methods of conservative treatment of these abnormalities of the vascular bed of the surface of the body However, plastic surgery can offer only the complete removal of the lesion, together with the overlying regional skin, and in this respect is no better than the destructive nonsurgical methods of attack These nonsurgical methods, aimed at obliteration of the nevus flammeus by fibrosis of the abnormal bed of capillaries, include the following electrodesiccation, cauterization, distance application of ultraviolet light, carbon-dioxide snow, liquid air, ignipuncture, electrolysis, Kromayer therapy, x-ray and radium therapy It is apparent that all these methods must be applied to the lesion through the skin, even though the skin itself may not be involved in the angiomatous process

In order to destroy the port-wine stain, the regional skin also must be damaged Deforming scar, the result of injury to the skin and subcutaneous tissue, replaces the port-wine stain if the given treatment is effective in destroying the lesion Since these lesions do not undergo malignant degeneration and do not increase in size with the passing of years, it is at once apparent that the ideal treatment is a method which will remove the objectionable feature of the port-wine stain and still preserve the skin of the area Recognizing the fact that the only objectionable feature of this lesion is its abnormal color—red, blue, or purple—the problem reduces itself to the simplicity of camouflage of its color It is well known that permanent change in the color of skin may be effected by injection of nonabsorbable pigments into the derma In a high percentage of port-wine stains the abnormal capillary dilatations are subdermal or in the deeper portion of the derma In such cases the superficial derma lends itself well as the carrier of a permanent camouflage of pigment particles

HISTO PATHOLOGY OF PORT WINE STAIN

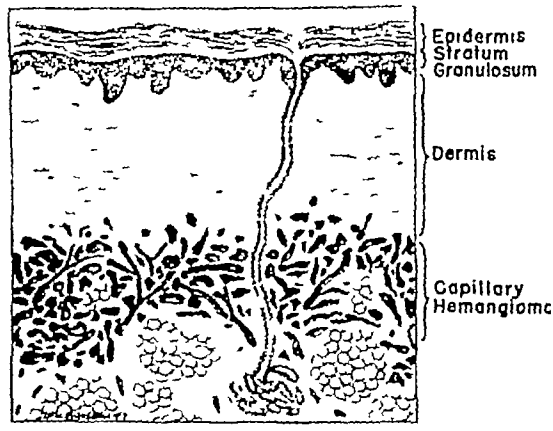


FIG 1 Artist's sketch of the relationship of the subdermal variety of port-wine stain to the overlying derma

Figure 1 is an artist's sketch of location of the capillary bed in a case of subdermal nevus flammeus The interpretation of the abnormal color of the port-wine stain is that the red, blue, or purple hue in the particular lesion is dependent upon the number of red blood corpuscles amassed in the abnormal capillaries, their degree of oxygen saturation (affecting as it does the coloration of erythrocytes from red to blue), and the reflection of this red through the overlying skin The variable amount of melanin in the stratum granulosum also contributes to the composition of the color effect of the port-wine stain

Historic Background

Tattooing for religious, ornamental, and identification purposes is reported as early as 2000 B C in Egypt and 1100 B C in China Today tattooing is used for these same reasons Savages still practice tattoo as a method of tribal identification, and civilized people still employ it for physical decoration The use of tattooing as a form of medical therapy can be traced to 1835, when Pauli employed it in the treatment of nevi, "congenital purple placques" and other lesions of the skin [1] Cordier (1848) advocated the tattoo treatment of nevi [2] In 1879 de Wecker used India ink successfully in coloring the corneal parenchyma [3] Thirty-two years later, in 1911, Kolle

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reported the use of tattooing with rose pigment to change the contour of the vermilion border of the lip [6] He also reported that nonadherent, flat, white scars were improved in appearance by the use of tattooing Knapp (1925) and Duggan and Nanavati (1936) used gold and platinum chloride to tattoo scars of the cornea [7] [8] Pickrell (1946) has demonstrated evidence in color photographs of excellent results following the tattooing of the cornea [7] In the recent literature Hance, Brown, Byars, and McDowell (1944) called attention to the value of tattooing in the matching of color of skin grafts and flaps on the face and in the simulation of the vermilion of the lip [9] Byars (1945) also reported successful intra dermal pigment injection for color matching purposes in 60 cases of free skin grafts and flaps of tissue on the face [9] Brown, Cannon and Mc Dowell (1946) reported improvement in appearance of one patient with a port-wine stain of the face following permanent injection of tattoo white and Chinese white [10] Conway and Docktor (1947) reported seven cases of port wine stain of the face treated successfully by tattooing [11]

Technic

The area to be injected is washed with soap and water, painted with aqueous solution of methiolate, and draped with sterile towels Instruments and pigments are sterilized The technician wears sterile rubber gloves The area should be free from infection At first the standard electromagnetic device (with needle holder and six needles attached) was used * This has been modified as shown in Fig 2 With sterile water the pigments are mixed into a thick paste which is placed in the cup of the needle holder The current which causes rapid oscillation of the needle is operated by a foot control The aqueous paste of pigments automatically feeds from the pigment cup into the needle holder as the needles oscillate in and out The needles are inserted into the skin at an angle of approximately 6 degrees so that the excursion of the needles will deposit the particles of pigment in an oblique plane at varying depths in the derma (Fig 3) Bleeding

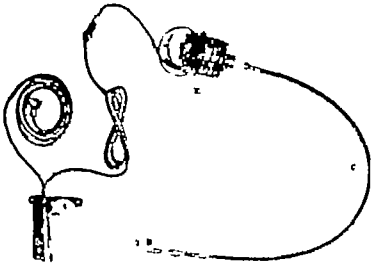


FIG 2. Photograph of the instrument now in use in the technic of permanent pigment injection The instrument has the advantage of feeding the pigment paste slowly from the pigment cup (*A*) into the hollow shaft of the needle holder (*B*) The rate of continuous flow of pigment paste is regulated by a screw The instrument is powered through a motor-driven flexible shaft (*C*) The oscillation rate of the needles is controlled by foot pedal (*D*) The instrument is quiet when in operation and the depth to which the needles penetrate is regulated easily (*E*) by the motor

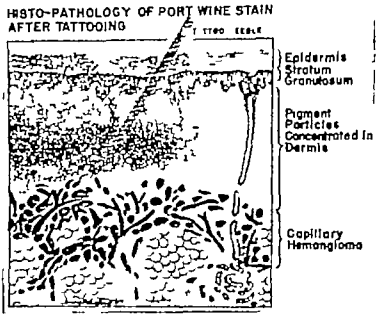


FIG 3 Artist's sketch of the technic of camouflage of port-wine stain by the intradermal injection of insoluble pigments. Those particles of pigment which are deposited in the derma reside there permanently Those which are deposited deep to the derma most probably are absorbed. Those particles which are deposited in the epidermis are desquamated eventually The process of desquamation requires that several weeks elapse after the first treatment so that the effect of intradermal injection may be judged fairly

and exudation of serum at the time of injection are managed by sponging between each application of the instrument.

The basic pigments in use at present include the following **

White	Titanium (or zinc oxide U S P)
Yellow	Oxide of iron
Red	Mercury sulfide (or cinnabar)
Red (flesh color)	Ferric oxide
Blue	Cobalt blue
Black	Black oxide of iron
Green	Hydrated chrome oxide

* The standard electromagnetic device was obtained from Burgess Battery Company "6 Ninth Avenue, New York City However this was equipped by the user with a shaft and five or six parallel needles. The instrument shown in Fig. 2 has been constructed by Frank Ellsen, M B Kassel and the author

** Pigment were obtained from Fezandie and Sperlle, "05 Fulton Street New York City

Combination of these pigments usually will produce the desired tints In addition, ochre, sienna, and other earthy metallic oxides may be used All these pigments are insoluble and may be sterilized in 70 per cent alcohol or may be autoclaved The mixture of colors varies with the individual case For the covering of port-wine stains, white is the basic pigment, occasionally mixed with a very small amount of red, sometimes in combination with green At the first treatment, a small area is injected and a record is kept of the combination of colors Following the treatment a sterile dressing is applied The patient is seen in twenty-four hours, at which time a crust is present over the injected area This peels away during the next six to ten days

Three to four weeks are allowed to elapse before judgment is passed on the effect of treatment Usually there is some absorption or desquamation of pigment during this period Though the greatest number of particles of pigment are deposited in the derma some are left in the region of the capillary dilatations and some are placed in the epidermis A few weeks must elapse before the effect of the absorption of the particles in the capillary dilatations and the desquamation of those in the epidermis can be judged Once the proper combination of pigments is decided upon, treatments may be given at two-week intervals until the entire lesion is injected An area of two to three square inches may be injected in a period of one hour by a skilled technician The number of treatments depends upon the size of the lesion The injection causes some discomfort, but the average individual tolerates this without anesthesia. In the treatment of children general anesthesia is necessary

Results

To date, 45 patients have been treated for port-wine stain by tattooing Experience indicates that not all port-wine stains respond equally well to camouflage by tattoo The variation in response is dependent upon the basic difference in the pathology of the lesions Andrews has classified port-wine stains as (*a*) subepidermal, those in which the abnormal capillaries lie under epidermis in the subpapillary zone of the skin, (*b*) dermal, those in which the abnormal capillaries are chiefly in the midcutis, and (*c*) subdermal, those in which the abnormal capillaries are in the subcutaneous tissue, subadjacent to the derma [12]

Since the inert pigments used in tattooing must be deposited in the derma if they are to remain permanently, it is apparent that this can be accomplished with ease in the subdermal variety of port-wine stain, effectively though less readily in the dermal variety, and not at all effectively in the subepidermal type It is this variation in the location of the abnormal capillaries which accounts for the difference in response of port-wine stains to permanent camouflage by tattoo

In the selection of cases for treatment, close scrutiny of lesion offers advance information as to the type of port-wine stain Biopsy is a more reliable guide However, it has been found that a given port-wine stain may be subdermal in part of its area, dermal in another, and subepithelial in a third portion In cases in which the degree of involvement of the derma cannot be ascertained accurately in advance, there is no objection to the trial treatment of a small portion of the lesion Bleeding and exudation of serum is encountered in the treatment of the dermal variety, but this is easily sponged away as the treatment is in process However, ready and bothersome bleeding at the time of tattoo puncture is evidence that the lesion is very superficial, that is subepidermal, and this observation carries with it the prognosis that tattoo treatment will not be effective In six cases the patients have been advised against tattoo treatment because of the establishment, by this observation and by biopsy, of the diagnosis of subepidermal variety of port-wine stain

It has been observed that a port-wine stain over the cheek, eyelids, nose, and upper lip may retain the pigment well in the malar and palpebral areas but not so well over the nose and lip In such cases repeated treatments over the skin of the nose and lip have been rewarded by successful camouflage In this detailed technical work the attitude and the ability of the technician are of the utmost importance The temperament of the average physician does not fit him for this work The treatment calls for the employ of a technician who appreciates the mixture of colors, who has a knowledge of aseptic technic, and who has patience and persistence More often the technician rather than the patient may become discouraged

Successful completion of treatment has been accomplished in 19 of 45 cases Twenty-six cases are still under treatment In the completed cases the lesions varied in size The largest was one which involved the surface areas of the upper and lower eyelids, the forehead, the entire cheek, one half of the nose and one half of the upper lip Sixteen treatments were given over a period of thirty-six weeks before treatment was completed One other case required sixteen treatments, but the majority of the other completed cases were lesions of 5 to 6 square inches, and for these the camouflage was completed in 5 to 8 treatments Two cases involved relatively little surface area and camouflage was effected after three treatments

Complications have been limited to experience in two cases In one of these there was regional cellulitis requiring hospitalization and therapy with antibiotics There was no resultant scar of the skin In the second case, a child of five years, subjected to other anesthesia each month for five months developed air-swallowing and symptoms of neurosis Temporary cessation of treatment resulted in relief from symptoms In six cases, as mentioned above there was excessive bleeding at the time of treatment Biopsy established the diagnosis of subepidermal type of port wine stain Therapy by pigment injection was discontinued and plastic surgical excision of these lesions is being carried out.

Summary

The permanent camouflage of port-wine stain of the face by the injection of insoluble pigments (tattooing) is presented Experience gained in the treatment of 45 cases has indicated that port wine stains of the dermal and subdermal type lend themselves well to camouflage by tattoo while those of the subepidermal type do not Cases are selected for treatment by close scrutiny of the lesion, by resort to biopsy and by trial injection of permanent pigments A modified electromagnetic device utilizing six parallel needles and a feeding cup for the pigment paste is described Of the 45 cases reported on, treatment is completed and satisfactory in 10 and still in process in 26 cases. In six cases the camouflage by tattoo was abandoned because of evidence that the port-wine stain was of the subepidermal type.

The opinion is advanced that port wine stains of the subdermal and dermal types the only objectionable feature of which is their color can be camouflaged permanently by the intradermal injection of insoluble pigments.

525 East 68th Street

Discussion

Dr Arthur W Gilck, *New York City*—Of the many methods used in the treatment of the port-wine stains I have observed none has been as acceptable to me as the method Dr Conway has presented.

The physical methods used by most dermatologists such as electrodesiccation CO_2, blistering doses of ultraviolet light etc. leave much to be desired, because the resulting scarring sometimes is worse than the original appearance of the lesion The same is sometimes true when a large lesion is excised and followed by skin grafting.

The operator must have a good color sense, although this is not too important in tattooing port-wine stains inasmuch as white pigment is used to counteract the intense erythema of such lesions However matching vitiliginous skin or skin grafts to the adjacent normal skin is not easy In fact an artist can match the pigments on the surface of the skin, but it must be remembered that color has to be reflected from the tattooed pigment which is below the skin. The resulting reflection of color is often not what one would expect or desire

The improvement is so dramatic in some cases that the patients have a new outlook in life They become gregarious, less shy and develop confidence in themselves. Patients who have used a heavy mask type of cosmetic such as made by Lydia O Leary now find that they can use a less complicated type of makeup which does not look so artificial and is easier to apply

Since most dermatologists are nihilists when such patients consult them I feel that now we can add another modality of great value in the treatment of port-wine stains. And for this I am grateful to Dr Conway for reintroducing a valuable cosmetic procedure.

References

1. Pauli Application de tatouage a la cure des naevi materni. Siebold s Journal 15: 1 (1833)
2. Cordier F S. Cited by A Lacassagne and E. Magitot, Dictionnaire des sciences medicales Vol 95 1886 p. 103
3. DeWecker L.: Chirugie oculaire, Paris, O Doi 1879
4. Kolle, Ferdinand Strange Plastic and Cosmetic Surgery, New York, D Appleton & Co., 1911
5. Dugsam, J N and Nanavati B P Brit. J Ophth. 20: 419 (1936)
6. Knapp, P Klin Mbl Augenh. 75: 22 (1925)
7. Pickrell Kenneth L. and Clark, Elon H Tattooing of Corneal Scars with Insoluble Pigments. Plast. & Reconstruct. Surg. 2: 44 (1947)
8. Hance G , Brown, J B Byars, L. T and McDowell F : Surg. Gynec. & Obst. 79: 674 (1944)
9. Byars L. T A n. Surg. 121: 614 (1945)
10. Brown, J B. Cannon B., nd McDowell A Plast & Reconstruct. Surg. 1: 100, 1946.
11. Conway Herbert I Dockto J he P S rg Gynec. & Obst. 84: 866 (194)
12. Andrews G C. Diseases of the Skin, Philadelphia W B. Saunders Co. 1946.

FEWER TWINS

Multiple birth appears to be a primitive rather than a lately acquired trait, and mankind is apparently losing the ability to produce more than one infant at a birth Dr A H Schultz of the Johns Hopkins University Baltimore believes An evolutionary decrease in the number of twins and triplets is shown by comparing present human procreation with that of apes and monkeys, which are much more apt to produce multiple births —*Modern Medicine July 1 1948*

THE PRACTICAL APPLICATION OF LOCAL HEAT

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(From the New York Post-Graduate Medical School and Hospital)

TODAY physiotherapy is assuming an increasingly important role in the treatment of many diseases, metabolic as well as post-traumatic Hence, because of the problem of the application of local heat as a therapeutic agent, a comparison and evaluation of the practical application of local heat was made in our clinic Innumerable methods have been used to test the relative effectiveness of the several heat-inducing mechanisms, but the superfluity of the reports indicates a number of variables involved in the measurement of heat actually delivered to the tissues For example, the thermocouple method measures not only the local tissue temperature rise but reflects the influence of many other factors, such as environmental temperature, humidity, perspiration, local blood supply, and certain systemic temperature-regulating mechanisms Heat is conveyed to the tissues by induction (as in hot water bath), by radiation (infrared lamp), and by penetration (short-wave diathermy) [1-8]

As stated, hot water baths heat the body by conduction The prevention of evaporation of perspiration helps to increase the heat of the tissues in contradistinction to hot air baths, which, by the cooling effect of the evaporation of sweat, actually delays the heating of the tissues or at least requires much higher temperature over a longer period of time to accomplish the same effect [7] The value of the modern whirlpool bath lies in the fact that higher temperatures may be borne more comfortably than still water and that the improved method of hydromassage permits direct application of a controlled underwater stream of bubbles of constant intensity The effect of this massage increases superficial vasodilatation and mechanically and reflexly increases tissue metabolism

Granted that the practitioner wants to employ heat as a therapeutic agent, the question is which form of heat shall he use? Naturally, he should be guided by the following criteria of any method employed First, which type of heat is most effective or efficient? Second, is the method safe? Third, is it economical?

To answer the first question, i e , to determine the relative effectiveness of the various types of heat therapy as applied in the physician's office or in the hospital, a study is here reported on the comparative local and systemic effects of the whirlpool bath, short-wave diathermy, and the infrared lamp on a group of normal volunteer subjects Two series were run, being limited to fifteen and twenty minutes of heat application, respectively

In the first series 44 observations were made on 22 individuals The subjects were first given short-wave diathermy to the right arm (a cuff electrode placed under the hand) On another occasion the subject inserted the arm, to a point midway between the shoulder and the elbow, in a radiant heat beaker at 120 F Three-minute oral temperatures were recorded In the second series of 18 cases, both oral and axillary temperatures were recorded Oral and axillary temperature elevations were used as a means of comparing the effectiveness of the various forms of treatment This method, instead of thermocouples or other alternatives, was used, since it offered as little departure as possible from ordinary clinical practice and produced a minimum of disturbance to the subject The subject was not allowed to partake of food or drink for at least thirty minutes before the beginning of the study, and he remained in a resting state during this period The environmental temperature, humidity, and barometric pressure were recorded, although no effort was made to control these factors, moderate variations were encountered with no appreciable effect on body temperature of the subject treated or other controls in the room during the experiment In these series no two clinical procedures were used on the same subject in any one day

The results of the first study paralleled the findings of the second series The results of the second series, therefore, are included because of greater completeness

In the second series the procedures were as follows

1 Immersion of the arm to the midpoint of the humerus in a whirlpool tank which was equipped with hot and cold inlets and an agitator Temperature of the water was elevated from 106 to 110 F in the first five minutes and held at 110 F for fifteen minutes Oral and axillary temperatures were recorded at the beginning and at the end of the treatment

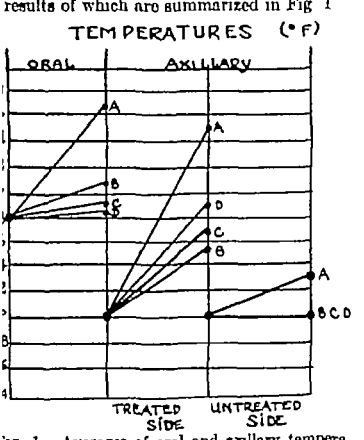
2 Second procedure was a twenty-minute exposure of the arm to infrared radiation of maximally tolerated intensity, with radiation from above only

3 Short-wave diathermy was employed by

This work was supported by research funds from the Section of Physical Medicine of the Department of Medicine New York Post Graduate Medical School and Hospital J F Marshand M D F L Eby, M D G Burke M D , E Swanson and H Sullivan assisted in the project

ig electrodes over the hand and over the belly
ie biceps muscle
. Induction coil diathermy applied around
arm from the hand to midpoint of the
ierus

This concluded the types of heat applications
results of which are summarized in Fig 1



'IG 1 Averages of oral and axillary tempera
es (F) of normal subjects prior to and following
local whirlpool, (*B*) infrared lamp (*C*) electrode
thermy, and (*D*) induction coil diathermy to
arm for twenty minutes

Under these conditions the rise in oral tempera
e during the whirlpool treatment was an aver
of 0 77 F , during the infrared radiation an
ange of 0.22 F , and during induction-coil
thermy an average of 0 13 F
As evidence of local heat absorption by means
venous circulation axillary temperatures were
lowed on the treated and untreated sides On
untreated side the axillary tended to parallel
oral temperature, while on the treated side it
owed a greater temperature rise than was found
dly This rise may indicate a temperature in
ease in the vascular bed of the extremity
ated
Most of the subjects experienced a mild warmth
the skin, and cutaneous hyperemia of the
ated part was noted especially with radiant
at and whirlpool Perspiration was very mild,
d none complained of more than slight dis-
mfort Following whirlpool, there was more of
sense of relaxation and warmth in the treated
remity The tissues were remarkably softened
arm appeared slightly larger rings fitted
ore tightly and the erythema of the arm
ually persisted for two to three hours. In all
ses the oral temperature returned to pretreat
ment levels within half an hour, usually within
twenty minutes

In a subsequent series, 25 patients suffering with rheumatoid arthritis were given hydrotherapy, each treatment lasting for a period of fifteen minutes Since, in our experience, this type of heat has proved most satisfactory in the treatment of arthritis it was decided to determine the effects of heat conduction on the erythrocyte count hemoglobin concentration, the leukocyte, and differential count, and on the erythrocyte sedimentation rate in normal persons and in patients with rheumatoid arthritis A modified Westergren method was used in the determination of the sedimentation rates Only arthritic patients having elevated sedimentation rates were used in this series Briefly, there were no essential changes in the erythrocyte count, hemoglobin concentration, white blood count and differential count, or in the sedimentation rate before and after the treatment

Blood pressures were not altered by any form of treatment except for decreased pressures as basal conditions were obtained

As a control for the study of the effect of local heat therapy on the oral and axillary temperatures five subjects were followed under conditions simulating those of the experiment, except that no heat therapy was given. In these instances there was no oral or axillary temperature that rose nor was there a decline toward normal when the initial temperature was higher than 98 7 F

Discussion

In an effort to evaluate the best method of heat application on extremities for hospital and office use it is apparent that all methods of local heat are effective in some degree However these studies compare favorably with previous work, in which the whirlpool bath was shown to be the most readily tolerated and the most effective in intensity of heat delivered and in the extent of peripheral circulation and relaxation experienced by the patient.[4,8–12] Clinically we have observed that hydrotherapy is superior to other forms of heat therapy, as confirmed by our experimental results, and offers an opportunity for active and passive exercise during the treatment.[12] The continuous stream of bubbles from the agitator which affords a constant and controlled massage and resultant relaxation of spasm in the tank permits greater muscular activity during the application of heat than any other form of heat therapy It is our clinical experience with over 3 000 cases that this mode of treatment gives the best therapeutic response with the least number of treatments

It is also of note that as a practical method of heat therapy on extremities diathermy is less

efficient than whirlpool, and although infrared lamp is convenient and not particularly hazardous, it, too, is less effective The depth to which heat was transmitted was not measured However, it is seen from the rise in axillary temperature that heated blood from the capillary beds in the skin transported heat to deeper tissues by way of veins (Fig 1)

Summary

1 In 18 normal subjects, exposure of the arm to varying types of heat therapy for twenty minutes caused elevations of body temperatures, as determined by oral temperature, showing the greatest rise following hydrotherapy

2 Indicative of deep heat transmission, axillary temperatures on the treated side of 18 normal subjects showed rises greatest after hydrotherapy

3 The erythrocyte count, hemoglobin level, leukocyte count, differential count, and the sedimentation rate were essentially unchanged in 22 normal subjects and 25 arthritic patients following fifteen minutes of hydrotherapy

4 Hydrotherapy in the form of whirlpool bath is the best modality of various heating agents employed for therapeutic purposes on an extremity (e g , the arm), because of the following factors

(*a*) Efficiency—Local hydrotherapy has been shown by us and by others to be the most effective means of repeatedly increasing local and systemic temperatures within the safe degree of application

(*b*) Safety—No untoward reactions, subjective or objective, were observed No special technical skill is required for the administration of heat in this form

(*c*) Comfort—Salutary psychic benefit of hydrotherapy on the patient is well known The relaxing effects relieve painful muscle spasm and render them more amenable to massage and exercise

(*d*) Low Cost and Availability—Hot water is available to the most isolated practitioner and most underprivileged patient The cost is that of heating the water Additional use of hydromassage provides the advantage of intensifing hyperemia and helping to further relax spasm

Conclusion

Hydrotherapy is pre-eminently the most desirable modality for the use of local heat on extremities

References

1 Pemberton R. J A M A 105 275 (1935)
2 Martin C J Lancet 2 561 673 (1930)
3 Hill D and Taylor H. J Annual Report of the British Committee on Chronic Rheumatic Diseases 4 149 (1938)
4 Benson S and Bowman W Arch Phys Therapy 17 749 (1936)
5 Ferderber M B and Sherman S. Pennsylvania M J , 462 695 (1943)
6 Coulter, J S and Osborne S. L. Arch. Phys Therapy 17 679 (1936)
7 Benedict, C G Benedict F G and DuBois E. F Am J Physiol 73 429 (1925)
8. Bennett R L. Hines E. A and Krusen F H Am. Heart J 21 490 (1941)
9 Gibbon, J H. and Landis, E M J Clin Investigation 11 1019 (1932)
10 Brown, G E. and Allen E V Am. Heart J 21 564 (1941)
11 Martinez C and Visscher M B Am J Physiol. 144 724 (1945)
12 Stenstrom W and Nuremberger, B Arch Int. Med. 44 556 (1929)
13 Currence, J D Arch Phys. Therapy 19 84 (1938)

Underwater therapy tank with turbine injector and infrared therapy lamp supplied by Ille Electric Corp New York diathermy apparatus supplied by Lepel.

PRO RATA PAYMENTS REPAID BY BLUE SHIELD IN BUFFALO

Western New York Medical Plan, Buffalo, has begun to repay amounts withheld from its participating physicians during the years 1941 to 1946, when pro rata payments were made

Most Blue Shield Plans have agreements with their participating physicians in which the doctors agree to accept pro rata payments for their services during any accounting period in which the Plan does not have sufficient funds from which to make full payment Such agreements serve as an underwriting guarantee for the Plan in lieu of large cash reserves

Total amounts withheld from Buffalo doctors during the six-year period were

1941	$3,975 65
1942	9,627 33
1943	18,855 54
1944	18,148 25
1945	6,543 38
1946	172,146 01

On May 26, 1948, the full amounts for 1941, 1942, and 1943 were repaid, and permission is being sought currently from the New York State Department of Insurance for the repayment of the amount withheld during 1944 The outstanding obligation for 1945 is relatively small and is expected to be retired within sixty days

The largest portion of the 1946 obligation is due to the suspension of all physician payments during November and December of that year when the doctors determined to forego their own fees in order to make the Plan solvent It is expected that the final payments will be completed within the next year

AMINOPHYLLIN DETERMINATION OF CIRCULATION TIME

LOUIS FRIEDFELD, M D F A C P HERBERT R MARCUS, M D , and JEFFERSON J VORZIMER, M D , F A C P , New York City

(From the Medical Services Beth Israel Hospital)

CIRCULATION time has been defined as the time interval required for blood to traverse a *given segment of the cardiovascular system, it is* essentially a measurement of the velocity of blood flow [1] Direct measurement of blood velocity in man has thus far been technically unfeasible, and the determination of circulation time has proved a clinically applicable velocity gauge [2] This time varies inversely as the average blood velocity the more rapid the rate of blood flow the shorter being the circulation time

A wide assortment of test substances has been used in an attempt to obtain a simple yet accurate *estimation of circulation time* The rationale has been the intravenous injection of a test substance and the observation of some subjective or objective manifestation as an end point, *timing* its arrival at a given organ or center Among the substances that produce a subjective end point are sodium dehydrocholate, calcium gluconate saccharine thiamin, etc , which produce variations in taste, smell and warmth The materials in this group have the advantages of being readily available relatively nontoxic, and not requiring extensive or unusual apparatus However since the end point is a purely subjective sensation, the accuracy of the time determination depends upon excellent patient cooperation This limits the use in children and uncooperative or mentally disturbed individuals.

The second group of test materials induces an end point which may be measured by objective means eliminating the important and variable factor of the patient's active cooperation As a group, however, their use is somewhat limited by the apparatus required and by the frequently encountered undesirable side reactions. In this category are such materials as histamine, sodium fluorescein, sodium cyanide, and radioactive substances.

It seemed logical to utilize the well-known effect of aminophyllin in causing a suddenly deepened and rapid respiration for the determination of the circulation time between the antecubital vein and the respiratory center Our experience with aminophyllin used for this purpose began in 1941 after the effects were noted in the treatment of Cheyne-Stokes respiration. The first report on the use of this drug in the determination of circulation time appeared in 1943 [3]

Following the rapid intravenous injection of 0.25 Gm of aminophyllin dissolved in 1 cc of solution, there is generally an explosive respiratory response manifested objectively as a sudden deep gasp tightening of the abdominal musculature, cough, or tachypnea Flushing of the face may also be apparent Subjectively, there may be a sensation of warmth in the head lightheadedness or vertigo These symptoms are transient in nature and are dissipated in one or two minutes Tachycardia and palpitation may occur and are of similarly short duration

The xanthines are known respiratory stimulants and act by direct stimulation of the respiratory center [4] Starr and his associates have demonstrated a 23 8 per cent increase in respiratory volume in subjects under basal conditions after the intramuscular injection of 0 48 Gm of aminophyllin [5] Sperling *et al* in a study of 22 patients graphically demonstrated an increase of 51 per cent in the depth of respiration following intravenous use of this drug [6] This direct and prompt reaction of aminophyllin on the respiratory center eliminates any time delay such as is noted with the sodium cyanide method

Method

In our series of cases it was found that accurate and definitive results were obtained with but simple preliminary preparation. The measurement of the circulation time with aminophyllin was determined on patients in the hospital in the outpatient department and in private offices (Table 1)

TABLE 1 —CIRCULATION TIME COMPARISON IN COMPENSATED PATIENTS

Pathologic Conditions	Aminophyllin (Seconds)	Saccharine (Seconds)	Calcium Gluconate (Seconds)
Coronary occlusion	12	17	
Chronic asthmatic and bronchitis	14	13	
Chronic osteomyelitis	12		12
Rheumatic heart disease inactive	17		17
Arteriosclerotic heart disease (no failure)	17	27	17
Hypertensive heart disease	10		18
Chronic gastritis	14		15
Psychoneurosis	15		24
Chronic cholecystitis	16		16

The patient is placed in a supine position and 1 cc. of a solution containing 0.25 Gm of aminophyllin is injected as rapidly as possible into the antecubital vein Timing is done with a stop watch and calculated from the beginning of the

TABLE 2.—Case Incidence

Circulation Time in Seconds	Cases	Per Cent of Total Cases
8 to 11	7	8 6
12 to 15	40	49 4
16 to 17	25	30 8
20 to 23	8	9 8
24	1	1 2

injection to the first appearance of respiratory stimulation In the beginning of this series we experimented with 0 5 cc containing 0 125 Gm of the test substance injected over a period of two to four seconds We found, however, that there were more failures and a greater percentage of indefinite end points than when 1 cc of the test material was rapidly injected

Results

Tabulation of the circulation times obtained in this series reveals close approximation to the results obtained by the other methods that utilized either test materials with subjective end point or objective measurements with various photoelectric cells, ultraviolet light, or radioactive counters The time in the majority of our normal cases (80 2 per cent) varied from twelve to nineteen seconds, with an average time of fourteen and six-tenths seconds (Table 2) This was found to be true even in aged patients without congestive heart failure, in whom we found not only normal circulation time but also sharp and definitive end points (Table 3)* This is in contradistinction to the findings of other investigators who found prolonged circulation time in elderly people who were not in congestive heart failure As might be expected a series of 12 cases of known hyperthyroidism disclosed very short circulation time ranging between nine and eleven seconds (Table 4) A group of cases of frank congestive heart failure (Table 5) disclosed essentially the findings of previous investigators, i e , prolonged circulation time which varied from twenty-four to thirty-eight seconds In these patients, corroboration was obtained by the use of the saccharine and calcium gluconate methods with close correspondence of the several test substances used As the congestive heart failure was relieved by appropriate measures, a corresponding decrease in circulation time was noted

TABLE 3.—Circulation Time in Elderly Patients

Patient's Condition	Age	Time (Seconds)
Pyelonephritis	75	13
Osteoarthritis	72	17
Polyposis of colon	65	15
Hypertensive heart disease	65	15
Generalized arteriosclerosis	97	17
Generalized arteriosclerosis	81	14
Generalized arteriosclerosis	104	17
Duodenal ulcer	72	13

TABLE 4.—Circulation Time in Patients with Hyperthyroidism

Basal Metabolic Rate	Circulation Time (Seconds)
Plus 26	10
Plus 38	11
Plus 49	9
Plus 40	10
Plus 9 (treated)	11
Plus 32	11
Plus 55	9
Plus 35	9
Plus 58	9
Plus 64	11
Plus 45	9
Plus 24	9

TABLE 5.—Circulation Time in Patients with Congestive Heart Failure

Clinical Condition	Aminophyllin	Saccharine
Arteriosclerotic	24	22
Coronary thrombosis	26	25
Hypertensive and arteriosclerotic	24 and 27	25
Rheumatic heart disease	20	21
Chronic bronchitis with emphysema	26	63 plus
Arteriosclerotic	32	25
Hypertensive	24	26

As with other methods, a small percentage of patients tested failed to react with a recognizable end point In our series, this was true in 4 7 per cent of the subjects However, in certain instances when there was no response to the more common testing substances, aminophyllin gave a definite end point The reverse situation was not noted

Toxicity

Aminophyllin has been used in many conditions and, despite the trepidation with which it is used intravenously, the literature contains a dearth of fatal accidents Merrill, in 1942, reported three cases of sudden death in elderly cardiacs following the slow intravenous injection of aminophyllin [7] Another report has appeared recently with similar results in three desperately ill patients, two suffering from acute coronary thrombosis and one in terminal uremia [8] The cause of these deaths remains obscure

While we have encountered no serious adverse reactions, we believe that this method should not be used at this time in the presence of possible internal bleeding, advanced cerebral-vascular disease, peptic ulcer, or coronary thrombosis Its chief applicability would be in those situations where the ordinary subjective methods are impractical due to failure of the patient to cooperate

Discussion

The chief practical value of the determination of circulation time is in those patients in whom the cardiac or pulmonary cause of dyspnea must be differentiated, as well as in the evaluation of changes in the degree of congestive heart failure [9] This problem arises often in elderly people in

* Studies in the aged were made with the cooperation of the Home of Old Israel

dyspnea may be due either to a failing usually arteriosclerotic, or to senile em ma and chronic bronchitis In the former tion, the circulation time is prolonged in tter it is unchanged This observation has as definite with the aminophyllin test d as with others previously used In cer ess commonly encountered types of heart e (with hyperthyroidism, severe anemia ri, or abnormal arterial shunt) the circula ime may be rapid even in the presence of stive heart failure because of peripheral dilatation or increased cardiac output, or and in vascular shunt In chronic pul ry disease the systemic blood velocity is ly normal

e method of determining circulation time by se of aminophyllin is readily applicable in tal clinic office or home It requires no sive preparation of the patient no unusual cialized apparatus and may easily be per- d by the physician himself without as- ts or even the active cooperation of the nt

encountered no important constitutional ons or serious local complications either due e rapid injection of this concentrated sub- e or following accidental extravascular in- filtration Local sloughs or phlebitis were not noted

Conclusion

The rapid intravenous injection of 0.25 Gm of aminophyllin in 1 cc. of solution is a practical and effective method of determining circulation time The end point is the objective manifestation of a sharp respiratory response. In our series, there have been no important systemic or local toxic effects This method has special applicability in those cases where the ability of a patient to cooperate in the determination of a subjective end point may be limited by age, language difficulties, cerebral changes, or state of consciousness

References

1 Fishberg, A. M Heart Failure, 4th ed. Philadelphia Lea & Febiger 1940.
2. Blumgart, H. L.: Medicine 10: 1 (1931)
3 Koster, H. and Sarnoff S. J.: J Lab. & Clin. Med. 28: 812 (1943)
4 Goodman L. and Gilman, A.: The Pharmacological Basis of Therapeutics New York, Macmillan Co. 1941 p. 274.
5. Starr I., Gamble, C. J Margolies A Donal, J S., Joseph, N and Eagle, E. A.: J Clin. Investigation 16: 799 (1937)
6. Sperling L. Weisman, S. and Papermaster H. Surgery 11 600 (1942).
7 Merrill G A. J A M A 123 1115 (1943)
8. Brennick D., Woodard W K. and Sageman, C B: *Ibid.* 136: 307 (1948)
9 Albrecht, F K. Modern Management in Clinical Medicine, Baltimore, Williams & Wilkins Co. 1947 p 228.

E OF QUICK POLIO TEST

pe of a quick and simple test for the infantile ysis virus to replace the expensive monkey test used is revived by a report from Dr Pierre epine, of the Pasteur Institute Paris to the al *Science* (August 6)

h a test would help doctors tell positively ner a child with a little fever and upset stomach ample is infected with the polio virus or just g an attack of the now prevalent summer e.

addition it would speed trials of new drugs for since doctors trying them could be sure they given to actual cases of infantile paralysis At nt this is difficult to determine and lack of such ledge means a drug must be tried in very many before doctors can be sure it is successful

orts to learn how epidemics spread could also eeded by a simple test inexpensive enough to rm on every suspected case

Lepine s test is simple enough. Essentially, sists in injecting material (feces) from suspected patients into the brains of five mice. Two days later the mice are given an injection into the brain of active Lansing mouse-adapted polio virus. At the same time another five mice are injected into the brain with the Lansing virus only Within ten or eleven days at least four out of five of these last mice should be dead or paralyzed. But at least three out of five mice also injected with the suspected polio material should be alive and well. The virus they got from the patient would have protected them against the fatal dose of Lansing virus that killed or paralyzed the control mice If the material did not protect them the patient did not have polio

This kind of test called interference protection has been tried before by other scientists but has not proved successful Whether the details of Dr Lepine s test such as method of concentrating the material from patients method of inoculation and time intervals, will make the difference between success and failure of the test remains for future study to determine Also to be learned is whether the test will succeed with other strains of polio virus.—*Science News Letter August 14 1948*

CONFERENCES ON THERAPY

DEPARTMENTS OF PHARMACOLOGY AND MEDICINE, CORNELL UNIVERSITY MEDICAL COLLEGE AND THE NEW YORK HOSPITAL

THESE are stenographic reports of conferences by the members of the Department of Pharmacology and of Medicine of Cornell University Medical College and New York Hospital, with collaboration of other departments and institutions The questions and discussions involve participation by members of the staff of the college and hospital, students and visitors A selected group of these conferences is published in an annual volume, Cornell Conferences on Therapy, by the Macmillan Company

Treatment of Painful Disorders of Skeletal Muscle

DR WALTER MODELL The conference today deals with the treatment of painful disorders of skeletal muscle That pain of this sort presents a therapeutic challenge is demonstrated by the length of the list of measures used in treating it Here is a list compiled by Dr Travell

1 Psychotherapy
2 Heat, massage, baths, electrotherapy
3 Deep x-ray therapy
4 Active and passive exercises
5 Supports, braces
6 Manipulation
7 Surgical section of muscle (e g , scalenus anticus)
8 Curare
9 Neostigmine (prostigmine)
10 Quinine
11 Ammonium chloride
12 Vitamin E
13 Nicotinic acid
14 Analgesics salicylates, morphine, codeine
15 Intravenous procaine
16 General anesthesia
17 Regional nerve block
18 Local block of trigger areas infiltration, needling, ethyl chloride spray

Dr Travell will open the discussion

DR JANET TRAVELL I shall confine my remarks to a special group of patients These are patients whose activities are limited by pain That is the complaint which brings them to the physician The pain is usually accompanied by restricted motion of one or more joints The limitation may be gross, or it may only be discovered by carefully testing the range of motion of special muscle groups Occasionally, limitation of motion cannot be demonstrated Localized areas of deep tenderness are always present in one or more of the muscles about the joints which exhibit limitation of motion, but signs of acute inflammation, such as redness, heat, and swelling, are lacking A change in contour due to spasm of a muscle or portion of a muscle is occasionally mistaken for swelling due to tissue exudate, but this does not happen often Some of these patients are confined to the house or bedridden, but the majority of them are only partially disabled and are working under serious handicaps Thus, most of them are ambulatory, and they make up a large percentage of the patients who come to the office of the general practitioner or to the outpatient department of the hospital

There need be, and often is, no demonstrable organic disease The syndromes under discussion are usually referred to by such terms as stiff neck, painful or frozen shoulder, tennis elbow, lumbago, sciatica, painful knees, etc , terms which do not imply any special etiology Of course, there has to be a cause One difficulty in the way of establishing the etiology is the fact that these disorders seem usually to be due to a combination of factors

Among the manifest causes, the foremost is probably trauma The role played by trauma is obvious in the muscular spasm associated with joint sprains, fractures, or contusions, but the role of trauma may be equally important even when the injury is slight or of such a nature that its connection with the pain syndrome is not readily traced The relationship is often overlooked because spasm is apt to develop gradually after minor injury and thus may not become painful until even a few days later This applies not only to the effects of a sudden wrench or jerk noted at the time, but also to the muscular pain and stiffness which may follow an unusual kind of exercise or excessive exercise

Less frequently recognized and equally important as a cause of pain is chronic muscular strain In this connection we must recognize that hurry, with its inefficiency of muscular movements, as in writing or ordinary household duties, places an increased load on the muscles Just as it takes more gasoline to drive a car a given distance at 60 miles per hour than at 30 miles per hour, there

are speeds of muscular performance for optimal efficiency, and beyond these conditions of hurry at work create in effect a form of muscle strain

Another precipitating factor in muscular pain is chilling the body as a whole, or cooling a specific area This effect is apparently achieved not only when the thinly dressed person stands in a biting winter wind but also on a hot summer day when the perspiring golfer sits in a gentle breeze under a shady tree on the nineteenth hole of the golf course. Pain is apparently more apt to result from chilling, when a person is fatigued Bierman inserted electrodes directly into the voluntary muscles and found that cooling the skin by a current of air resulted in a prompt fall of muscle temperature presumably due to reflex vasoconstriction It may well be that this vasoconstriction plays a part in producing the pain

Visceral disease is an important cause of painful spasm of the voluntary muscles There are familiar examples of such visceromotor reflexes for instance, the localized muscular spasm or abdominal rigidity which accompanies acute appendicitis or any other variety of the acute surgical abdomen Another example is the splinting of the chest muscle in acute myocardial infarction It is not well known, however that visceral disease may lead to persistence of pain patterns established during the acute attack and furthermore, that this intractable pain sequel may be amenable to local block of trigger areas located in the spastic skeletal muscles

The etiologic factors in painful muscle spasm also include certain neurogenic causes I have in mind particularly nerve root irritation due to pressure for example, by a herniated intervertebral disc The painful cramps of peripheral neuritis as noted in vitamin B deficiency, should be mentioned Other precipitating factors include the toxins of acute and chronic infections—tetanus for example Certain metabolic factors may play a role in the development of spasm A high proportion of patients with such chronic muscular pain have low basal metabolic rates of the order of minus 15 to 20 per cent. A few show a slight anemia with 65 to 75 per cent hemoglobin In other patients psychogenic factors seem to play a predominating role in the etiology of painful muscular spasm. When any of these factors is present pain may be only temporarily relieved or may remain quite refractory to local treatment of the affected muscles until the basic disorder is corrected This applies also to trauma induced by continuing or repeated muscular strain but not to a single episode of trauma after which the results of local block may appear truly miraculous

I have been asked to discuss certain therapeutic measures directed at the muscle itself namely local infiltration of the intramuscular trigger areas and the application of ethyl chloride spray to the overlying skin We may group these procedures under the term "local block" therapy, in contrast to "regional nerve block."

The theory underlying this kind of treatment is that the painful spasm is an expression of a reflex which, once initiated is self propagating Thus, spasm leads to pain, pain to further splinting and spasm, and so the vicious cycle sustains itself Brief interruption of this pain cycle at any point may abolish it permanently provided the conditions which initiated it in the first place are no longer intact.

To apply local block methods successfully, one should have a knowledge of the pain reference patterns of the different muscles of the body It is not widely known that each muscle gives rise to a specific distribution or pattern of referred pain which is relatively constant from person to person These patterns are not strictly segmental in distribution and they do not follow any peripheral nerve distribution. Once these patterns have been learned the sources of pain can be readily predicted The site of origin of the referred pain is commonly spoken of as a "trigger area" When one is infiltrating the muscle, it is this area which must be hit directly with the needle.

The presence of a trigger area within a muscle is demonstrated by the fact that when pressure is exerted on it or a needle inserted into it (which also exerts pressure), a spread of pain is clearly perceived by the patient in its specific reference zone. In other words, that spot is positively identified as the source of the pain felt at a distance. The reference zone, which can be mapped in this way by mechanical stimulation of the trigger area, should coincide with the region where the patient complains of spontaneous pain. If it does match one may be sure that at least one of the sources of pain has been found

Local Infiltration—For local infiltration we prefer a 0.25 to 0 5 per cent solution of procaine hydrochloride in physiologic saline There is no epinephrine in the solution It must be pyrogen-free, since the injection of pyrogens into these hypersensitive areas sets up intense afterpain for as long as several days Obviously care must be taken to insure asepsis The skin is cleaned with alcohol and painted with mild tincture of iodine On routine testing a small number of ampules have been found to be cracked or defective at the tip and therefore all ampules are boiled with the syringes and needles just prior to use. Some of the details of the local infiltration technic were presented at a previous therapy conference * and we have not changed them in any important respect since The kind of material used for infil-

* New York State J Med 45: 2090 (Oct. 1) 1945.

tration is not nearly so important as the place where it is put, provided, of course, that the material is not toxic Trigger areas can be blocked by infiltration with physiologic saline or merely by needling the area, with no fluid injected Thus, our observations confirm the benefits derived from the old Chinese technic of acupuncture Local infiltration or dry needling may be regarded as satisfactory when the procedure immediately abolishes local tenderness at the site of the trigger area, does away with the spread of pain induced by pressure, reduces the total quantity of spontaneous pain, and obtains an increase in the range of motion if limited It should be noted that the use of procaine makes the treatment much less disagreeable to the patient in that it cuts down the intensity and duration of the pain reference set off by insertion of the needle We have as yet no satisfactory data as to whether the addition of procaine increases the efficacy of treatment as compared with physiologic saline alone So far, we have not learned how to reproduce experimentally the abnormal state known as a trigger area

At the first treatment, it is usually wise not to inject many different muscles but rather to select one or two major trigger areas and obliterate them completely, by repeated infiltrations if necessary This is important, since incomplete blocking of trigger areas is one of the causes of increased pain following injection At the next visit, an evaluation is made of the results of the first treatment A satisfactory response to local block therapy may be predicted at this time (1) if there was marked amelioration of pain after the treatment, even though this lasted for only a few hours, (2) if the gain in motion which was noted immediately after injection has not been lost to any appreciable extent, and (3) if the activity of the treated trigger areas has been reduced, as indicated by a change in the intensity of the pain reference induced by pressure and needling If no appreciable benefit according to these criteria is noted after two or three treatments, it is not considered worth while to pursue this method further In fact, if substantial relief is not secured rapidly, the patient will usually not submit to any more injections, since the momentary pain set off by needling trigger areas of high spontaneous activity may be very intense An early appraisal of the results is, therefore, important

In acute cases, one treatment is sometimes sufficient to secure complete and permanent relief In longstanding cases, however, it seems that one muscle after another becomes involved in the process so that a multitude of trigger areas develop, and a series of treatments are usually required to eradicate all of these foci of pain The second treatment is usually timed from three to five days after the first, and subsequent treatments are given at intervals of a week or two, as indicated

Ethyl Chloride Spray—The use of ethyl chloride spray was described for treatment of ankle sprains by Cozen and Hollombe in 1940, and as "surface anesthesia for the relief of painful motion" by Kraus in 1941 We have likewise found that this procedure may at times relieve pain and limited motion associated with muscular spasm and in a manner that is sometimes remarkable The application of the spray is so simple that we are apt to try it as the first procedure in most cases The benefit to be derived from ethyl chloride spray can usually be estimated at once A particular trigger area is selected and its sensitivity to pressure is noted The overlying skin is then lightly sprayed during a period not exceeding two or three minutes, according to an interrupted technic which I shall describe, and the activity of the trigger area noted again As in the case of local infiltration, a good response may be expected if the spraying immediately abolishes or reduces deep muscle tenderness and referred pain on pressure, increases the range of motion, and reduces pain at rest or on motion If the effect of the spray as determined on one or more such test areas is not striking, we usually proceed at once to local infiltration with procaine If the effect of the spray is sufficiently encouraging, we may repeat this procedure at intervals as indicated, and an excellent result may be obtained by this method of treatment alone

We have found that attention to certain factors seems to increase the effectiveness of ethyl chloride spray, and we believe that the details are important The procedure, as we do it, is as follows

The patient is made comfortable and the part to be sprayed is well supported so that the muscles can relax The tube or bottle of ethyl chloride is held one to two feet away from the patient The spray is applied at an acute angle with the skin The stream is passed over the region of the trigger area in one direction at a uniform speed with an even sweeping motion The motion is not unlike that used in applying paint to a wall with a brush The ethyl chloride on the skin is allowed to evaporate, and, about one second later, the sweep is repeated in the same direction This "make and break" spraying is continued with a regular rhythm Sometimes only one passage of the spray over a given trigger area will cause it to disappear, but more often it requires 15 or 20 such sweeps One may occasionally observe transient activation of the trigger mechanism by the spray If the spray is painful at first or sets off referred pain when applied over the trigger area, the rest periods between sweeps are lengthened to allow the induced pain to subside In the intervals,

that part of the body which is being sprayed is moved gently within the limits of pain to stretch the affected muscle

It should be noted that the nozzles of the ethyl chloride containers vary a good deal A commercial make should be selected which delivers neither too fine nor too coarse a spray A very fine mist seems to be relatively ineffective, a heavy stream spatters and is unpleasant to the patient and also wastes the material.

We are also using ethyl chloride spray as an adjunct to local infiltration of trigger areas, that is as soon as the injections have been completed, the treated areas are sprayed in the above manner This procedure seems to reduce the muscle soreness or "lameness" which ordinarily follows trauma due to needling and is in line with the observation that ethyl chloride spray may permanently relieve pain due to trauma, such as joint sprain.

It seems scarcely necessary to mention that ethyl chloride is a highly volatile and inflammable liquid so that fire hazards must be eliminated It is also a general anesthetic agent and care should be taken that the patient inhale as little of it as possible Since the vapor is heavy, the patient's head should be above the part sprayed Some movement of air in the room is desirable

The mechanism of action of ethyl chloride spray on trigger areas in the muscles is probably different from that of the local infiltration and needling technics It is clear however, that neither one depends on a local anesthetic effect in the ordinary sense of this term Neither can the effect of spraying be due to refrigeration anesthesia of the structures beneath the skin. Care is taken to avoid a degree of cold which produces aching or frosts the skin. Furthermore it can be shown by the intradermal injection of an irritant solution that this method of light spraying which blocks trigger areas does not block pain impulses even from the superficial layers of the skin.

Adjuncts to Local Block.—I want to emphasize that local block is usually not the only therapeutic measure that we employ because even in the apparently simple cases of acute spasm we are apt to find that something has been wrong with the muscles for some time before the acute attack. We use, therefore a system of treatment which combines a variety of measures for the relief of painful muscle spasm

In the first place we limit any form of exercise or work which places a heavy load on the affected muscles This is quite simply accomplished by telling the patient that he must avoid doing anything which produces pain which lasts for more than a second or two after the effort Pain itself is deleterious in that it reflexly builds up more spasm therefore it is unwise to attempt to drive a muscle beyond the point of pain direct the patient to move the part fr such a way as to provide gentle stretc affected muscles at regular intervals stance, if extension at the shoulder is patient may be directed to reach up a marker on the wall every hour Stretch be carried out within the limits of pain so forcibly as to produce a lasting ach stretch We rarely put the patient to often we get him up out of bed

As soon as the acute pain is controll block therapy more vigorous exercise tuted and it is determined by trial an much the patient can do That form o recommended which the patient forme and for which his muscles were previou and developed Swimming is often con best exercise to improve muscular fu one cannot direct a person to swim learned how and expect him to use p tioning muscles properly He may e and if so his muscles will derive much fit from tennis than from another spo he was never accustomed or in which skilled Furthermore, it is our expe free-moving and pleasurable games pr cular relaxation to a much greater d does useful work about a house, such carpentering, and gardening since thes are all based on repetitive movement small range of motion

External heat is helpful especiall baths and hot water bags Intense he diathermy, often seems to intensify Massage is employed only when the i has subsided when trigger areas of taneous activity are present, manip massage of these areas may aggravat On the other hand, when applied a stage, massage is very beneficial.

We usually employ some internal m Ascorbic acid is given routinely to ev receiving local injection therapy as a 1 0 Gm. by mouth daily In case of s we use aspirin in doses up to 4 Gm da occasionally combined with codeine never prescribe morphine for obviou Incidentally the opiates are not nearly in pain due to muscle spasm as they a forms of pain

An effort is made to discover mechan which may have led to the evolution syndrome In particular we try first t chronic strain associated with repeti ments. For instance if episodes of p neck recur in a certified public accou spends hours copying figures out of a b at his side we have him place the book

and curare? Has he another group which receives physiotherapy alone?

Dr Ransohoff The vagaries of the disease are so great that I would not know how to set up a control group to ascertain differences in ultimate outcome due to curare However, our electromyographic studies show that physical therapy alone, hot packs or stretching, for instance, does not accomplish the same results without curare as it does with curare Thus, the therapeutic results are in a sense controlled by electromyography

Dr Wolff We have tried curare in a few patients with spastic states associated with myelitis to relieve spasm, and, indeed, it did relieve it, but the patients were left so weak as the result of this action that it was of doubtful value I wonder whether the margin between relaxation of spastic muscles and weakness of the remaining useful muscles is wide enough for curare to be of any help in this problem

Dr Travell Differences in results may be due to differences in preparations In the chronic spastic states, such as the cerebral palsies, hemiplegias, etc , in which Schlesinger reported satisfactory results, d-tubocurarine in wax and oil was used exclusively He noted that, with aqueous solutions of the curare alkaloids, it was very difficult to secure the relaxing effect without unpleasant side-effects

Dr Gold Dr Ransohoff, would you recommend that a general practitioner use curare or any of its preparations in his office for a patient with a sprained back or dislocated shoulder with a good deal of muscle spasm?

Dr Ransohoff The use of curare is not a satisfactory office procedure One has to be prepared to have the patient lie there for about three hours He won't be able to walk right away

Dr Gold What about a smaller dose?

Dr Ransohoff A smaller dose does not produce the desired effect With aqueous preparations of curare, it is apparently necessary to produce a peak effect which lasts about forty minutes During this time the patient is too dizzy and too diplopic to walk about comfortably

Dr Gold Are we to conclude that one cannot secure some relaxation of muscle spasm by means of curare without making the patient ill and uncomfortable?

Dr Ransohoff That is correct In treating acute shoulder and back pain, we hospitalize the patient and we never use curare alone We always give it in conjunction with physical therapy

Dr Travell I should think that curare, certainly in aqueous solutions, would not be a safe office medication In the hospital, provisions exist for meeting emergencies connected with its use, such as prostigmine for injection and some means for giving artificial respiration

Dr Ransohoff That is true, but it is interesting that in our experience with thousands of injections of aqueous curare, we have given prostigmine as an antidote only two or three times in poliomyelitis, and I am not sure that it was necessary in these

Dr Carlton Hunt It should be kept in mind that the patient with myasthenia gravis is particularly sensitive to curare, so that the usual therapeutic dose may produce marked paresis

Dr Modell Dr Hunt, would you say a few words about the mode of action of curare?

Dr Hunt The smallest effective doses of curare in mammals produce a block at the myoneural junction In experimental animals, relatively huge doses also produce a block at synapses in the sympathetic ganglia and induce central nervous system effects Different muscles of the body exhibit differences in susceptibility to this drug Studies in man have shown that paralysis of muscles innervated by cranial nerves results before any significant paralysis is produced in the somatic musculature of the trunk and limbs and before any significant effect is produced in the electromyograph It should be emphasized that the dose of curare required to cause any appreciable degree of general neuromuscular block is not far below the dose which causes paralysis of the respiratory muscles

Dr Modell How do you think it acts to relieve the pain in poliomyelitis?

Dr Hunt It seems to me most likely that this effect of curare is due to its action at the neuromuscular junction relaxing the spastic muscles Experimental studies show that relatively small doses of curare block neuromuscular transmission of high frequency stimuli more readily than of low frequency stimuli

Dr Travell It seems to me that the relief of pain by small doses of curare in acute anterior poliomyelitis might be the result, at least in part, of the blocking of the sympathetics, which is known to occur in these patients because of the cutaneous vasodilatation in the extremities The fact that very large doses of curare are required to produce a sympathetic block in the normal does not rule out the possibility that this action may play a role under special conditions

Dr Cattell In large doses, curare may have some effect on sympathetic nerve function by its action on the ganglia to block conduction However, it appears more probable that the cutaneous dilatation seen in patients is due to the release of histamine from the tissues, which has been shown to occur experimentally when large doses of curare are given to animals I agree with Dr Hunt that there is a theoretical basis for a greater effect of curare in the presence of muscular spasm In such muscles, impulses are presumably being con-

ducted across the myoneural junction at a relatively rapid rate, and such high frequency stimuli are blocked by a degree of curarization which is without effect on the conduction of single impulses. It, therefore, seems to me very probable that the relief of pain following the administration of curare in Dr Ransohoff's patients was mediated through a reduction in muscle spasm

DR MODELL Dr Hansson how do you treat painful spasm of skeletal muscles?

DR. KRISTIAN G HANSSON In the painful spasm of acute anterior poliomyelitis, application of moist heat is our treatment of choice at the present time We prefer a therapeutic tank with a temperature of 106 F (41.2 C) for one-half hour twice a day This procedure is followed by passive stretching to obtain the normal length of the muscles. Another type of painful spasm occurs in connection with acute traumatic conditions, such as lumbosacral strains sprains, peritendonitis about the shoulder, and so forth In these conditions, applications of heat effleurage manipulation and stretching exercises are of benefit. However, whatever therapeutic means are used to overcome the painful spasm it is most important to follow it up by an attempt to restore the normal muscle length

DR. TRAVELL Is it also your experience that in the extremely painful forms of muscle spasm the application of diathermy may sometimes produce an immediate exacerbation of pain?

DR. HANSSON When painful muscle spasm is associated with an increased blood supply as in the case of congestion, the use of any form of heat, either external or internal, in the form of diathermy or short wave, is indeed often followed by an exacerbation of pain Under these circumstances, the application of cold in the form of ice bags is more rational and may be followed by relief of pain.

DR. MODELL Stretching a muscle in painful spasm sometimes relieves the pain and restores the normal range of motion, but then, at other times stretching does harm Dr Liebolt, would you tell us something about this?

DR. FREDERICK LEE LIEBOLT The active or passive stretching of a muscle in spasm, without anesthesia, is effective in relieving pain and restoring motion in certain conditions, for example that which follows acute subacromial bursitis The act of stretching such muscles gives rise to pain during the procedure but once the spasm is overcome the pain disappears, and the motion becomes normal Passive and actual stretching of muscles which have shortened to the stage of contracture, as may be the case in fractures, bursitis and trauma is most important and will do no harm If the muscle is acutely inflamed however as in acute poliomyelitis repeated active and passive stretchings will prove quite harmful, producing additional irritation and inflammation leading to fibrosis When the stage of fibrosis has been reached, stretching may do more harm than good The atrophied structures have been infiltrated or replaced by fibrous tissue and, here, manipulation without anesthesia will simply stretch this tissue and serve to stimulate additional fibroblastic activity, manipulation, under anesthesia will tear the taut structures produce hemorrhage, and simply traumatize the tissue further

DR. MODELL How do you distinguish between spasm and contracture? What is the difference between spasm and spasticity?

DR LIEBOLT Spasm is an involuntary muscular contraction which may be of short or long duration but which is always temporary, contracture is an involuntary muscular contraction of long duration which unless treated, is always permanent. Although spasm and spasticity are sometimes used as synonymous terms I do not consider them to be the same, because spasm refers to a temporary, protective, and nonpathologic state of muscular contraction without changes in the reflexes, while spasticity refers to a permanent, nonprotective and pathologic state of muscular contraction associated with changes in the reflexes

DR. MODELL Dr Wolff, have you treated any patients with painful muscle spasm by psychotherapy?

DR. WOLFF Muscles do contract as a part of a general state of tension and apprehension in which there is overalertness associated with quick movement and hurry in attempting to get more done than the time or the situation permits The intravenous use of sodium amytal, 0 1 to 0.5 Gm., in a few people who have painful muscles and such a general tension state as I have just mentioned has occasionally, in a dramatic way relaxed the patient and eliminated the pain for variable periods. The long term psychotherapy in people who have muscle contraction as part of their reaction to stress is as difficult as that in patients with any other bodily change associated with life stresses and I would say the results are about as good or as bad

DR. TRAVELL What degree of narcosis was produced in the patients who received sodium amytal? Was it a full anesthetic dose?

DR WOLFF No these patients were able to communicate and speak They were half-asleep and unsteady on their feet at the time They were able to leave the table in about an hour

DR MODELL Would spinal anesthesia or deep ether anesthesia have the same effect in breaking the cycle of painful spasm as the local block measures which you described?

DR TRAVELL These procedures have been used successfully Dr Rovenstine's group at Bellevue is employing regional nerve block which produces temporary muscular relaxation, and they report that permanent relief of pain may follow I see no reason why spinal anesthesia could not be used in the same way, but perhaps it entails more risk There are also reports of patients who were prepared for a disk or fusion operation, and, for some reason, the anesthetic had to be discontinued even before a skin incision was made, but their pain was completely relieved Anesthesia was apparently sufficient to interrupt the vicious cycle permanently

DR WOLFF Intravenous procaine raises the cutaneous pain threshold somewhat Is there ever any indication for that rather than for aspirin by mouth?

DR TRAVELL I have had no experience with it Dr Bobb is here from New York Post-Graduate Hospital, and perhaps she would answer your question

DR AUDRIE L BOBB I have used intravenous procaine in three cases of painful muscle spasm None of these responded favorably The group at Post-Graduate claims that the best results with it are obtained in patients with osteoarthritis, but this yields to so many measures that I am not sure to what these good results are to be ascribed

DR TRAVELL Are you still using intravenous procaine in the type of painful muscle spasm we are considering today?

DR BOBB I have given it up

DR MODELL Could we dispose of some of the other agents listed at the start of the conference?

DR. WOLFF Dr Comroe of the University of Pennsylvania tells me that, after a most careful analysis of the effects of prostigmine in patients with excessive muscular contraction associated with joint disease in some instances, he has not been able to find any evidence that prostigmine is therapeutically useful Have you any?

DR TRAVELL When the reports on the relief of muscle spasm by prostigmine first came out, I used it enthusiastically in a few selected patients with chronic pain of the type I have described The drug was given parenterally for as long as a month or two, and so far as I could see, did not relieve pain in these patients

DR WOLFF How about vitamin E?

DR TRAVELL I listed vitamin E because of its reported use in fibromyositis I don't use it routinely and am not yet convinced that it influences painful spasm of the skeletal muscles

DR MODELL Dr Travell, how about quinine?

DR TRAVELL Quinine is included in this list because of its effect in some cases of nocturnal calf cramps I have seen patients in whom this troublesome phenomenon was perfectly controlled by the continued administration of 10 grains of quinine sulfate at bedtime Whenever the medication was stopped, the cramps recurred It isn't always effective, and the largest tolerated doses may fail in cases that are indistinguishable from those in which it succeeds

DR WOLFF When I have used it, the side-effects of the quinine have been so disagreeable that the patients did not like it In myotonia congenita, the patient prefers the moderate cramps to the effects of quinine I never tried it in the more painful states

DR MODELL What would you say about nicotinic acid?

DR GOLD For what purpose? For the histamine-like, capillary dilator action to improve the circulation in muscle?

DR TRAVELL Yes, I have used it in a few cases in fairly large amounts by mouth, up to a gram a day, and have not been impressed with the results

DR MODELL Why is ammonium chloride included in the list?

DR TRAVELL In the occasional case, dramatic relief of pain is secured by the oral administration of ammonium chloride, 0 5 to 1 0 Gm three times a day The mechanism is unknown, but it might depend on the production of a diuresis and withdrawal of fluid from the muscles

DR MODELL In acute coronary thrombosis, pain is sometimes unrelieved by morphine You mentioned that local block might be effective under these circumstances When should this form of treatment be applied?

DR TRAVELL We apply it whenever the agonizing pain of acute coronary thrombosis does not subside spontaneously If trigger areas can be found in the parasternal or precordial regions, the injection of one or two of these tender points may terminate the pain at once so that no further analgesic medication is needed Just spraying the chest with ethyl chloride will sometimes accomplish the same result

DR MODELL How long would you wait before you institute that treatment?

DR TRAVELL I would not wait at all The minute I saw such a patient I would spray the chest with ethyl chloride We have three cases in which the pain stopped at once and did not return

DR MODELL What part of the chest was sprayed?

DR TRAVELL The front of the chest, especially the sternal and parasternal regions, and the precordium Special attention was paid to discrete localized areas of deep tenderness

Summary

DR GOLD The conference this afternoon dealt

ie of the very common problems encoun- practically every branch of clinical medi umely, the painful spasm of skeletal mus- While painful spasm may occur in practi- l muscles of the skeletal system, there are groups especially prone to become so in- and these fall into certain fairly well-de- ain syndromes, known by a variety of such as lumbago, the frozen shoulder, and

Acute spasm in certain muscles, such as a severe cramp in the calf which may awak tient out of a sound sleep may cause pain over the area of the knotted muscle mass the other hand many of the cases present ıbtle problems in that the pain is referred ırea distant from the site of the abnormal

In order to control these it is imperative to the abnormal muscle giving rise to the d pain, and in this connection it was l out that every muscle of the body has a pattern and area of reference which directs the muscle in spasm. This muscle is identi the fact that it possesses areas of deep ten s, it shows a localized contraction when it sed, and it causes pain when it is stretched ypersensitive spots within these muscles, l trigger areas, give rise to pain in the refer ones, when they are stimulated by pressure tretching or needling

r well-defined technics were described for ating painful spasm in skeletal muscles so-called local block methods, (2) stretch- muscles with or without general anesthesia arization and (4) moist heat in the form of bs It was pointed out that these are not lly exclusive, and it was emphasized that onal measures are often imperative in order ure the best immediate results as well as asting relief in problems of painful spasm. ite anterior poliomyelitis, the use of curare ly relieves the muscle pain but affords an unity for appropriate stretching of the d muscles so as to prevent chronic shorten- d deformities. Some cases require salicyl and codeine as supplementary agents pts are made to reach such underlying as trauma, chilling of the body chronic lar strain resulting from hurry repetitive nents poor posture, and incorrect furniture , impaired circulation as in anemia and ittent claudication low basal metabolic rate tension and anxiety states which might yield to psychotherapy, chronic infection, and mechanical compression of nerve structures There seems to be some experience indicating that certain vitamins might have a place in these conditions, such as ascorbic acid, nicotinic acid, and vitamin E and intravenous procaine injections have been tried

While all of these systemic approaches and attempts at the control of underlying causes are of great importance, there remains the fact that in a large proportion of cases underlying organic disease cannot be found, cannot be corrected, or does not exist, and the further fact that the most spectacular advance in the control of these painful and crippling skeletal muscle states has been made in the attempts at local relief of the spasm within the muscle itself The so-called local block technics received special attention, for these are accessible to the general practitioner for use in a wide variety of cases which he encounters in his office practice and in the hospital Their utility is based on the notion that in many of these painful spasms a self-sustaining cycle of spasm–pain–spasm persisting long after the precipitating cause has vanished may be permanently abolished by an interruption of a reflex mechanism Of the two technics, the successful infiltration of trigger areas in muscle requires considerable experience in the matter of localization The successful application of ethyl chloride spray would seem to require less skill and may well lend itself to use by the intelligent patient himself Here then are simple forms of treatment wherein a patient limping with a sprained ankle may walk off freely following a few sprayings with ethyl chloride, or a patient barely able to put on his coat because of an excruciatingly painful frozen shoulder may be able to swing his arm about freely following a few skillfully placed injections of procaine or a few sprayings with ethyl chloride, or a patient with acute coronary thrombosis and thoracic pain which does not yield well to morphine experiences prompt relief after a few applications of the ethyl chloride spray Clearly not all cases respond and in many the response is slow incomplete and only temporary but there are those in whom these simple measures provide relief from pain and disability in a manner as dramatic as any experience one is likely to encounter in therapeutics.

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ne looks one can usually find a positive spu- ometime during the course of bone tubercu- —*Exchange*

Routinely x-raying all hospital admissions is not only good clinical medicine but it helps safeguard hospital personnel.—*Exchange*

FORTY-SECOND ANNUAL MEETINGS

of the

DISTRICT BRANCHES

of the

MEDICAL SOCIETY OF THE STATE OF NEW YORK

PROGRAMS

Sixth District Branch

Wednesday, October 6, 1948
Hotel Arlington
Binghamton, New York

Afternoon Session

2 30 P M —"Carcinoma of the Colon and Rectum Diagnosis and Treatment" (Lantern slides)
Henry B Sutton, M D, F A C S, Ithaca, attending surgeon, Tompkins County Memorial Hospital and Cornell University Infirmary and Clinic
John W Hirshfeld, M D, F A C S, Ithaca, visiting surgeon and research associate, Cornell University Infirmary, formerly associate professor of surgery, Wayne University College of Medicine

3 30 P M —"Management of Hypertension"
James Bordley, III, M D, F A C P, physician-in-chief and director, Mary Imogene Bassett Hospital, Cooperstown, formerly associate professor of medicine, Johns Hopkins University, School of Medicine

4 30 P M —"Prepayment Medical Plans"—Round-table discussion
Moderator Mr George P Farrell, director, Bureau of Medical Care Insurance, Medical Society of the State of New York
"Why Doctor Participation Is Necessary for the Success of a Medical Care Plan"
Carlton E Wertz, M D, chairman, Council Committee on Economics, Medical Society of the State of New York
"How the Central New York Medical Plan Serves the Doctor and the Public"
Leo E Gibson, M D, president, Central New York Medical Plan
"Why Medical and Surgical Care of Utica Has the Largest Member Participation of Any Plan in the State in Relation to Blue Cross Subscribers"
John F Kelley, M D, vice-president, Medical and Surgical Care, Inc

Evening Session

7 00 P M —Dinner
Introduction of officers of the Medical Society of the State of New York
Address by the President, Leo F Simpson, M D, Rochester
Remarks by Mrs Edgar M Neptune, president of the Woman's Auxiliary to the Medical Society of the State of New York

8 30 P M —"Diabetes Today"
Priscilla White, M D, F A C P, associate of Dr Elliott Joslin at New England Deaconess Hospital, Boston

Ladies will join the members of the Sixth District Branch for dinner

Officers—Sixth District Branch

President Binghamton	Charles L. Pope M D,
First Vice-President Norwich	Norman C Lyster M D
Second Vice-President Binghamton	Elton R. Dickson M D,
Secretary Montour Falls	Paul F Willworth, M.D,
Treasurer Oneonta	Marshall Latcher M D,

Presidents of Component County Societies

Broome	Jacob C Zillhardt, M D Binghamton
Chemung	Arthur C Glover M D, Elmira
Chenango	John A Hollis, M D Norwich
Cortland	Robert H Kerr M D, Cortland
Delaware	Charles K Ives M D, Roxbury
Otsego	Edward J Keegan M D Oneonta
Schuyler	Francis C Ward M D Odessa
Tioga	Arthur J Capron, M D Owego
Tompkins	Henry W Ferris, M D Ithaca

Seventh District Branch

Thursday September 30 1948
Veterans Administration Facility
Canandaigua, New York

Morning Session

9 30 A.M.—Motion pictures, Abdominal Total Hysterectomy and Perineorrhaphy' and 'Subtotal Gastrectomy for Gastric Ulcer'

"A Practical Consideration of Commoner Endocrinological Problems Encountered in General Medicine

Ivan Heklman, M D associate professor of medicine University of Buffalo School of Medicine, assistant attending physician, Buffalo General Hospital

Recent Advances in the Treatment of Arthritis

L. Maxwell Lockie, M.D professor of therapeutics, University of Buffalo School of Medicine

"The Council of Rochester Regional Hospitals A Review of Its Two Years' Experience

Paul A. Lembcke M D associate director

1 00 P.M.—Luncheon

Introduction of Officers of the Medical Society of the State of New York

Address by the President, Leo F Simpson M.D Rochester

Remarks by Mrs Edgar M. Neptune president of the Woman's Auxiliary to the Medical Society of the State of New York

Afternoon Session

2 00 P M — Water Balance in Acute and Chronic Disease

Maurice Bruger, M.D associate clinical professor of medicine and chief division of pathological chemistry, New York Post-Graduate Medical School and Hospital Columbia University

"The Use of Anticoagulants in the Prevention and Treatment of Thrombo-embolic Complications of Coronary Occlusion with Myocardial Infarction

Charles D Marple, M D New York City research fellow in medicine, Cornell University Medical College

Ladies will join the members of the Seventh District Branch for dinner

The Executive Committee of the Seventh District Branch will donate a prize of $25 to that Woman's Auxiliary (except Ontario) from which county there is the largest percentage of physicians registered at this meeting.

Officers—Seventh District Branch

President Hornell	Kenneth T Rowe M D,
First Vice-President Rochester	George H Gage M D.,
Second Vice-President Clifton Springs	Samuel A Munford M D
Secretary Penn Yan	Glenn C Hatch, M.D.,
Treasurer Hornell	James J Yanick, M D

Presidents of Component County Societies

Cayuga	Charles T Yarington M D., Moravia
Livingston	Foster J Hamilton, M D Hemlock
Monroe	Ellis B Soble M D Rochester
Ontario	Leon A. Stetson, M.D Canandaigua
Seneca	Charles M Smith M D Waterloo
Steuben	Vrooman S Higby M D Bath
Wayne	James H Arseneau, M D Lyons
Yates	Ralph H. Davis, M D Penn Yan

NECROLOGY

Nathan Bernard Bluestone, M D, forty-four, of Yorktown Heights, died on August 25 Dr Bluestone was graduated from the University of Glasgow in 1933 A former lieutenant colonel in the Army, he had served in Europe with the Medical Corps during World War II Dr Bluestone was an associate physician on the staff of Peekskill Hospital and also served on the staff of Northern Westchester Hospital in Mt Kisco and Bellevue Hospital, New York City Dr Bluestone was a member of the American Medical Association and the New York State and Westchester County Medical Societies

Heywood Hill Hopkins, M D, of Rochester, died on May 13 at the age of fifty-two Dr Hill received his medical degree from Harvard Medical School in 1922 and subsequently studied at New York Hospital under Dr Eugene Pool and in Vienna and Paris He settled in Rochester in 1927 where he established his practice, specializing in orthopedic surgery He was associated with the staffs of Genesee Hospital, Monroe County Infirmary, and Strong Memorial Hospital He also served as consultant in orthopedic surgery for Bath Memorial Hospital and Tompkins Memorial Hospital, Ithaca Dr Hill was a member of the Rochester Academy of Medicine, the Rochester Pathological Society, the New York State and Monroe County Medical Societies, the American Academy of Orthopedics, and the American Medical Association

I. Julius Martinson, M D, died in his home in New York City on August 24 He was seventy-five years old Dr Martinson was graduated from the University of Dorpat in 1898 and had been a practicing physician in New York since that time He was a member of the American Medical Association and the New York State and County Medical Societies

Bernard Joseph Mulcahy, M D, Poughkeepsie, died at his home on August 21 at the age of thirty-five Dr Mulcahy, an eye, ear, nose, and throat specialist, was a graduate of the University of Vermont College of Medicine in 1937 He served his internship at Vassar Brothers Hospital, Poughkeepsie, where he served as clinical assistant in ophthalmology and otolaryngology at the time of his death He also served as assistant physician in ophthalmology and otolaryngology at St Francis Hospital, Poughkeepsie Dr Mulcahy was a flight surgeon with the Army Air Corps during World War II and spent two of his four years in the armed services in the European Theater He was a member of the American Medical Association and the New York State and Dutchess County Medical Societies

Charles Pines, M D, of the Bronx, died on August 21 at the age of sixty-five Dr Pines was graduated from New York University and Bellevue Hospital in 1911 Dr Pines had served on the staff of Bellevue Hospital for over thirty-five years and at the time of his death was an assistant professor there He was an assistant physician in dermatology and syphilology at this hospital, as well as on the staff of Goldwater Memorial Hospital, New York City Dr Pines was a member of the American Medical Association, the Bronx Pathological Society, and the New York State and Bronx County Medical Societies

Hanford Waterfield, M D, of New York City, died August 18 He was fifty-two Dr Waterfield was graduated from the College of Physicians and Surgeons, Columbia University, in 1933, and interned at Fifth Avenue Hospital A veteran of World War I, he had served on the medical staff of Kings Park State Hospital, Kings Park, Long Island, and for a long time practiced in Hempstead Dr Waterfield had been appointed senior assistant in Lenox Hill Hospital's neuropsychiatric clinic on June 1 and last month was also named assistant psychiatrist at the Vanderbilt Clinic in the Columbia-Presbyterian Medical Center He had previously served on the psychiatric staffs of New York Post-Graduate Hospital and the Payne-Whitney Clinic in the New York Hospital-Cornell University Medical Center Dr Waterfield was a member of the American Medical Association, the American Psychiatric Association, the Long Island Psychiatric Society, and the New York State and County Medical Societies

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COUNTERACT BARBITURATES

People who take overdoses of the barbiturate sleeping medicines, either by accident or with suicidal intent, may in future be saved by having a kind of tourniquet put around the middle of the chest to constrict it This possibility appears in a report by Drs Augustus C P Bakos and William L Howell of Georgetown University School of Medicine in the journal, *Science*, July 9

The barbiturate sleeping medicines affect the breathing center in the brain When a poisonously large dose has been taken, breathing goes on only through reflex drives But at this stage, the rate of breathing in dogs can be increased by compression of the chest, the Georgetown scientists found The compression was done with the kind of cuff doctors use in taking blood pressure This seemed to elicit and maintain a reflex from the lungs which kept the animals breathing even when the breathing center in their brains had been deadened by the drug

Preliminary observations, the scientists report, show that the maneuver may be effective in cases of barbiturate poisoning, although not enough data have been obtained to be sure —*Science News Letter, July 24, 1948*

HOSPITAL NEWS

Medical Center Sends Specialists Abroad

IN KEEPING with its policy of promoting the exchange of knowledge and experience with medical men of foreign countries, Columbia Presbyterian Medical Center has just sent five specialists abroad On the list of subjects to be discussed with the doctors of over a dozen foreign countries are obstetrics plastic surgery, diseases of the ear nose, and throat, immunochemistry and cancer

In the past, on similar trips Medical Center doctors have carried important American medical 'know how' abroad and have in turn brought back the latest findings as to new drugs and methods of treatment. On such a trip in 1930 to England, Dr John Lockwood, attending surgeon brought back the first news of the modern sulfa drugs.

Dr Howard C Taylor, Jr director of obstetrics and gynecology of the Presbyterian Hospital and professor of obstetrics and gynecology of Columbia s faculty of medicine left this country in July with a group of Unitarian Service Committee doctors for exchange of medical information and experience in Germany Dr Taylor's plans include clinical work in Frankfurt, Berlin Göttingen, Munich, Tuebingen Freiburg and Heidelberg

Dr Edmund P Fowler Jr director of the otolaryngology service of the Presbyterian Hospital and professor of otolaryngology of Columbia University's faculty of medicine, has flown to Oslo Norway From Oslo Dr Fowler goes to Copenhagen to present a paper before the Collegium Otolaryngologicum an international "ear nose and throat' group Following this he plans a trip to Stockholm for an informal meeting with other doctors on the subject of impaired hearing

Dr Jerome P Webster attending surgeon of Presbyterian Hospital and professor of clinical surgery of Columbia's faculty of medicine has left for Shanghai China to inaugurate a program to develop the teaching of plastic surgery in that country The program is under the joint sponsorship of the American Bureau for Medical Aid to China and the Commission on Medical Education of China s Ministry of Education Beginning the program on October 1 Dr Webster will give an eight weeks' course in plastic surgery at Shanghai's Chungshan Hospital The course will be attended by surgeons from teaching faculties of all Chinese medical colleges On his arrival in China in September Dr Webster will deliver lectures on his specialty in Peking Canton, and Nanking. Dr Webster is vice-president and a director of the American Bureau for Medical Aid to China.

Dr Michael Heidelberger chemist of the Presbyterian Hospital and professor of biochemistry of Columbia University's faculty of medicine, sails soon for France and Switzerland While abroad, he will attend the Eighth Congress of Biological Chemistry in Paris and will act as a delegate from the American Association for the United Nations to the World Federation of United Nations Associations in Geneva. Professor Heidelberger will also give lectures on biochemistry and allied subjects in various cities in France and Switzerland

Dr Henry T Randall assistant resident in surgery Presbyterian Hospital, will visit cancer research centers in London, Edinburgh, Stockholm Paris and other cities. The purpose of his trip is to investigate and report on the latest trends in cancer research and treatment in those centers

Psychiatric Service Recommended as a Vital Part of General Hospital Care

LEADERS in the field of mental health have for many years recommended the establishment of a psychiatric service as a vital part of any well-rounded medical program in general hospitals. The Hospital Council of Greater New York, recognizing the importance of this objective, incorporated such a recommendation in its master plan for hospitals and related facilities, according to a recent report in its *Bulletin*

The general hospital is the logical place in which to advance the cause of psychiatry in the treatment of many physical ills that are aggravated by mental disturbances as well as to treat purely psychiatric patients, the Council pointed out.

Frequently when the inclusion of psychiatry in the general hospital is discussed one is left with the impression that a separate unit for the sole treatment of psychiatric patients is the first requirement. Good psychiatric service for general medical and surgical patients may be attained without the establishment of a separate unit.

From the prevention standpoint this is an important factor Dr Franklin G Ebaugh in a monograph prepared for the American Hospital Association, points to the tremendous increase in chronic psychiatric cases and declares "It is highly possible that had many of these been offered general hospital psychiatric care at an early state of their illness and not been neglected they would never have reached this state

He further points out that, in spite of the fact that relatively few general hospitals have made provision for the care of nervous and mental patients, 'Every general hospital admits psychiatric patients without knowing it and they are usually treated without any consideration for the psychiatric issues.'

There are certain advantages of a separate psychiatric unit for the treatment of early psychiatric conditions in the general hospital From the patient s point of view there is a great stigma in becoming a patient in a mental disease institution The general hospital implies no such stigma, irrespective of the illness.

Treating the psychiatric patient in the general hospital is also a very real advantage to the community in both a social and an economic sense By early treatment of psychiatric disorders many border line patients will be prevented from being committed to publicly supported mental institutions thus effecting tremendous savings in tax dollars

While the development of a psychiatric unit in the general hospital is an important factor in the integration of psychiatry into general medicine, it should be pointed out that a psychiatric service can be instituted without necessarily setting up a separate physical unit for psychiatric patients only

In these days when hospitals are under scrutiny by the community, and when the need for psychiatric treatment is acute, and too often unavailable, a combination of psychiatric and other medical forces would do much to bring about greater public understanding Furthermore, it would come nearer to giving the community what it wants and expects from its general hospitals—centers of medical care where the average citizen can get good medical and hospital service, irrespective of his illness

Grants Awarded by Multiple Sclerosis Society

THE National Multiple Sclerosis Society has announced that it made grants totaling $77,600 to five medical institutions to conduct medical research into the causes and control of multiple sclerosis

Ralph I Straus, president of the society, said that the allocation for the new research projects was voted by the society's board of directors Included in the grants was a fund to establish the second multiple sclerosis research clinic to be financed by the society, at the Albany Hospital, Albany

Neurologists of the Albany Medical College will cooperate with the Division of Research and Laboratories of the New York State Department of Health in conducting the research program at the clinic

The largest of the grants went to Tulane University School of Medicine, New Orleans Other institutions receiving aid were the Massachusetts General Hospital, Boston, Cedars of Lebanon Hospital, Los Angeles, and the New York University School of Medicine

American College of Surgeons to Hold Hospital Conference in Los Angeles

THE twenty-seventh annual Hospital Standardization Conference will be held at the Biltmore Hotel, Los Angeles, from October 18 to 22, in conjunction with the thirty-fourth annual Clinical Congress of the American College of Surgeons, according to an announcement by Dr Malcolm T MacEachern, associate director and chairman of the Administrative Board

A galaxy of hospital authorities from all parts of the United States and Canada will participate as speakers and discussion leaders in the five-day program. The last day of the conference, Friday, October 22, will be devoted to study tours of hospitals in Los Angeles and vicinity with the cooperation of the Southern California Hospital Council, of which Paul C Elliott, superintendent, Hollywood Presbyterian Hospital, is president The chairman of the committee which is assisting Dr MacEachern in planning the twelve sessions of the Hospital Conference at the hotel is Ritz E Heerman of Los Angeles, superintendent of the California Hospital

Among the other well-known speakers will be Rev John J Flanagan, S J , St Louis, executive director of the Catholic Hospital Association, James A Hamilton, Minneapolis, professor of hospital administration, University of Minnesota, Horace Turner, Spokane, administrator, Deaconess Hospital, and president of the Association of Western Hospitals, Dr Herman Smith, Chicago, hospital consultant, Dr Curtis H Lohr, Clayton, Missouri, superintendent and medical director, St Louis County Hospital, Kenneth Williamson, Chicago, assistant director, American Hospital Association, Dr G Otis Whitecotton, Oakland, medical director, Highland-Alameda County Hospital, Paul H Fesler, Oklahoma City, administrator, University Hospitals, Dr Frank R Bradley, St Louis, director, Barnes Hospital, and professor of hospital administration, Washington University, Dr Joseph Clemmons, New York, medical director, Roosevelt Hospital, and Dr Anthony J J Rourke, San Francisco, director, Lane and Stanford University Hospitals

Physicians and surgeons, trustees, nursing directors and educators, medical record librarians, and many of the other professions represented in the hospital, will also address the sessions "Newer Developments in Medical Science and How They Affect Hospital Administrative Practices" will be discussed from the standpoints of surgery, medicine, pathology, and nursing The "Trend of Hospitals to Supply Facilities and Services for Members of the Medical Staff" will be presented from three angles use of a staff office, use of a doctors' professional building connected with the hospital, and use of one floor of the hospital for doctors to see patients

A symposium on "Current Medico-Administrative Advances in Hospitals" will include a talk on "Hospitals and Anesthetists" by Dr Henry K Beecher, Boston, anesthetist-in-chief, Massachusetts General Hospital Other meetings include a joint session with the American Association of Medical Record Librarians, a joint session for hospital trustees, physicians, and administrators, a round table conference on problems of the small hospital in maintaining acceptable standards, a public relations breakfast conference, a forum on trends in hospital administration, and a panel discussion on "Nursing the Patient," at which the first speaker will be Pearl McIver of Washington, president, American Nurses' Association, and director of Public Health Nursing, U S Public Health Service

Regulations Given for Hospitals Participating in Federal Program

IN A letter sent to all voluntary hospitals in New York City the Hospital Council of Greater New York stated that all applications which are to be considered for funds allocated during the first two years of the State Hospital Plan should be forwarded to the Hospital Council not later than September 30 1948

It was explained that 'the State Hospital Survey and Planning Commission is most anxious to set up its program for the first two years of construction at an early date The State regulation provides for a period of sixty days after solicitation of sponsors, for filing of application for current funds

The Hospital Council as the official agent for the State Commission pointed out that only Part I of the application is required by that date Part I the Council continued, is a preliminary request and does not require detailed plans of the project. Projects which are not advanced to that stage will be considered for subsequent years' allocations.'

'The first two years funds,' the Council went on to say cover the period beginning July 1 1947 and ending June 30 1949 The contract (Part IV completed) for projects utilizing funds for the first year of the program must be awarded by June 30, 1949 and those for the second year of construction by June 30 1950 Ample time is therefore allowed for the completion of detailed plans"

The letter stated that "all of the projects in New York City will be considered as special projects, since the law was primarily enacted to help rural areas The Council has considered the need for facilities for premature infants as most needed throughout the City also that general care beds are most urgently needed in the Borough of Queens. These two types of facilities have been given a high priority by the Council, and the State has indicated that a fair proportion of the funds might be available for such projects

It was pointed out that special projects which incorporate facilities for long term illness, mental disease, tuberculosis, or communicable diseases into the general hospital will receive special consideration although the available funds are exceedingly limited'

The letter informed the voluntary hospitals that the staff of the Hospital Council will be available to assist them in this matter

Births in Hospitals Increase in Eleven Years

THE United States Public Health Service reported in August that tremendous progress has been made in the last eleven years toward improving the conditions under which American babies are born

The agency reached that conclusion by comparing vital statistics for 1946 the most recent year for which a complete report is available and 1935 the first year in which full figures were kept. During the eleven-year period the percentage of babies delivered in hospitals more than doubled The number of births not attended by physicians dwindled just as sharply

In 1946 82 4 per cent of all live births occurred in hospitals In 1935 the proportion was 30 9 per cent. The number of deliveries attended by physicians outside of hospitals was 12.2 per cent of the total in 1936 50 6 per cent in 1935

Only 5 4 per cent of the 1946 births were attended by midwives or other nonphysicians. In 1935 12.5 per cent of America s babies arrived without a doctor's aid

Blue Cross Plan Adds 964,926 New Members

BLUE Cross hospital service plans now have an enrollment of 81 210 819 in the United States and Canada. A growth of 964 926 new members in the second quarter of 1948, the Blue Cross Commission of the American Hospital Association announced in August

Associated Hospital Service, New York led all other plans with a second-quarter growth of 131,286 new members. Michigan Hospital Service Detroit was second with 68 312 new members, and Connecticut Hospital Service Inc. New Haven, was third with 62 868

Rhode Island leads all states in participation on a percentage basis with 68 per cent of its population enrolled

Of the total membership 29,010,080 participants are in the United States (including Puerto Rico) and 2 194 739 in Canada

NEWS NOTES

Establishment of a medical center to provide free treatment for 30 000 employes of 150 New York City hotels has been announced by the Hotel Association of New York City and the New York Hotel Trades Council

Otsego County needs more than twice its present total of hospital beds Dr John J Bourke Albany executive director of the State Joint Hospital Survey and Planning Commission told medical and hospital leaders in Oneonta at a July open forum meeting

Dr Bourke said his visit was to remind county residents of their opportunity for Federal and State aid in establishing a coordinated program for improving public health work, and providing better medical service and hospital care He said Fox Hospital Oneonta and Bassett Hospital, Cooperstown, have a

total of 157 general beds, whereas the county needs 360—280 general beds and 80 for chronic disease patients

The group in attendance voted to push the matter by expanding a joint committee of Otsego County Medical Association and Otsego County Tuberculosis and Public Health Association

United Hospital, Mamaroneck, has arranged to install entirely new and up-to-date heat-pressure sterilizing units throughout the institution, according to an announcement today by Superintendent Richard C Leavitt This development is part of the hospital's rehabilitation program and follows closely the re-equipping of the x-ray department and the perfecting of the pathology laboratory

Plans are being made for the establishment of a school for handicapped children at Bowne Memorial Hospital, Poughkeepsie, according to an announcement by Dr James E McCambridge, president of the board of education The school was recommended by the Dutchess County Medical Society

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Albany Hospital, Albany, has been established as the site of a new research clinic for the investigation of causes and controls of multiple sclerosis The new clinic, opened in August, will operate from 9:00 A M until noon every Monday

A new wing is being added to Westfield Memorial Hospital, Westfield, this fall It is to be fireproof and consists of a basement and one story

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An expansion program that will boost the capacity of Wilson Memorial Hospital, Johnson City, to about 480 beds will begin in September, according to a recent announcement from the hospital

Among other points involved in the expansion, the addition to the east wing will provide space for the construction of new and larger kitchen facilities in the basement, permit major expansion of the hospital's outpatient department now housed in the southern portion of the wing's ground floor, permit the hospital to comply with recent orders of the State Health Department affecting nursery facilities The maternity ward now on the wing's fourth floor will be expanded substantially and will provide for a much larger pediatric division on the fifth floor of the structure

Details of the program, which has been under study by hospital officials for several years, were announced by Robert L Eckelberger, hospital administrator

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Lourdes Hospital, Binghamton, is planning to install a department of cardiology that will greatly increase the institution's facilities for combating heart disease, according to a recent announcement by Dr Ralph J McMahon, chief of staff

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Members of the medical profession are invited to attend the departmental conferences and demonstrations to be held at Mount Sinai Hospital, New York City, during September Those scheduled are Neuropathic demonstrations, 9 30 A M, September 20, Dr Oppenheimer's urologic grand rounds 9 10 A M, September 21, Dr Garlock's surgical grand rounds, 9 00 A M, September 23, pediatric conference, 9 30 A.M, September 23, oral surgical and pathologic conference 4 00 P M, September 24, neuropathic demonstrations, 9 30 A M, September 27, Dr Oppenheimer's urologic grand rounds, 9 10 A.M, September 28, siminar on medical history, 8 30 P M, September 28, Dr Garlock's surgical grand rounds, 9 00 A M, September 30, pediatric conference, 9 30 A M, September 30, medical and surgical conference, 10 30 A M, September 30

The Brooklyn Jewish Home for Convalescents, Far Rockaway, Queens, received its first patients in August The 100-bed institution, designed to serve the entire city, will be open only to men and women without means Applications have been received in large numbers from individuals, hospitals, physicians, and social work agencies in behalf of patients in need of rest, fresh air, and nursing care The applications should be made to the home's Brooklyn headquarters at 130 Clinton Street Latest advances and equipment for handling postoperative and convalescent patients are provided in the building, for which formal dedication exercises will be held some time in September

PERSONALITIES

Appointed

Dr Martin R Steinberg, formerly on the faculty of the Graduate School of Medicine, University of Pennsylvania, and since 1945 assistant director of Mount Sinai Hospital, as director of the hospital, succeeding Dr Joseph Turner, director of Mount Sinai since 1928, who has been named consultant to the board of trustees As full-time radiologist at Wyoming County Community Hospital, Warsaw, Dr Melvin S Martin, radiologist at Binghamton City Hospital since May, 1947 Earle H Daniel, formerly prosthetic specialist for the medical rehabilitation division of the Veterans Administration, Washington, D C, as chief of the prosthetic service, Institute of Rehabilitation, New York University-Bellevue Medical Center

As officers of the medical board of Southampton Hospital president, Dr John H Nugent, Southampton, vice-president, Dr Victor K Young, Riverhead, secretary, Dr Emma Bellows, Southampton, chief of surgery, Dr David H Hallock, Southampton, chief of medicine, Dr LeRoy B Davis, Westhampton Beach, chief of obstetrics, Dr S R Jagger, Westhampton Beach

MEDICAL NEWS

Tuberculosis Group Enlists Foreign Language Press

DR. KENDALL EMERSON, president of the New York Tuberculosis and Health Association New York City has announced the formation of a Foreign Language Press Committee to aid the Association in its health education and public relations program The new group believed to be the first of its kind in the country organized to assist a health organization on a permanent basis will be headed by Sigmund Gottlober director of the American Foreign Language Press

"Foreign language newspapers published in New York have an aggregate circulation of close to a million Dr Emerson said, and it has been felt for some time that this important group of publications should be enlisted in the campaign to eradicate tuberculosis and to make New York generally a healthier city in which to live

In addition to Mr Gottlober as chairman and Dr Herbert R. Edwards executive director of the New York Tuberculosis and Health Association, and Frederick Hodgson public relations director, as ex-officio members, the new committee will include as members Dr Charles Foeldy of the Amerikai Magyar Nepszava Andrew J Valuchek, of the New Yorksky Denník Mark Weinbaum, Novoye Russkoye Slovo George Generalis, Greek National Herald, Julio Carzon La Prensa, Dr Richard Van Dyck, Aufbau and Mrs. Kathe Vordtriede Staats Zeitung

The committee, Dr Emerson said, will be a continuing body and will not only function in fund raising but will carry on year round work on behalf of health education tuberculosis case-finding, rehabilitation and other projects

Extension Courses for Army Nurses

THE Army Nurse Corps has announced that in connection with its expanded educational program, extension courses are now available to Reserve nurses, covering a variety of topics in military orientation and hospital administration

At the Medical Field Service School, Fort Sam Houston, Texas, Major Margaret E Harper and Captain Ruth M Stolts have been assigned to prepare subcourses to the extension series which are especially designed to appeal to nurses and to fit their professional needs These are now ready

The Army Nurse Corps is currently urging all Reserve nurses to investigate the subject possibilities of the various subcourses and to apply without delay Especially recommended are those available in military orientation

Interested Reserve nurses should address inquiries to the Director Medical Field Service School Brooke Army Medical Center Ft. Sam Houston Texas or to the Unit Instructor Organized Reserve Corps, in their area for information about these courses

Funds Made Available for Scientific Research on Alcoholism

THE third grant made this year for research on the problems of alcoholism by the Research Council on Problems of Alcohol has been made public by Joseph Hirsh acting director of the Council He announced that the grant of almost $5 000 was being made available to the Chicago Committee on Alcoholism for the conduct of research work in one of the leading institutions in Chicago Announcement of the exact location and nature of the research project to be undertaken will be made at a later date by Dr A J Carlson, professor emeritus of physiology University of Chicago and president of the Research Council on Problems of Alcohol.

The funds for this research project were part of a larger sum underwritten this past winter and spring by the citizens of Chicago for research throughout the nation. This was the first public fund raising campaign to support research in this field

Mr Hirsh reported that previous grants this year for investigation into the problems of alcohol and compulsive drinking made by the Research Council were to the Cornell University Medical College of the New York Hospital, $30 000 underwriting the second year of a five-year project, and $20 000 to New York University College of Medicine-Bellevue Hospital

Childhood Diseases Take Fewer Lives in New York State

A DROP in deaths caused by childhood diseases was balanced in the State during the first six months of 1948 by a rise in deaths caused by afflictions of middle and old age the State Health Department has reported.

The department announced that the death rate of 11 6 for each 1,000 population was approximately the same as that recorded for the same half year of 1947 But many individual variations showed up

Now high mortality levels were set the department reported in heart disease with a mortality of 458 3 for each 100 000 cancer, with a rate of 180 cirrhosis of the liver 17 6 and diabetes, 45 1

Balancing these were new lows recorded for whooping cough cause of 22 fatalities in the State, streptococcal sore throat cause of 14 deaths and diarrhea and enteritis, which killed 134 children under two years old, but set a new low death rate of 0.5 for each 1 000 children.

National Drive Begun to Spur V D Education

A NATION-wide educational drive to wipe out syphilis and gonorrhea by persuading the public to take blood tests and physical examinations was started in August by the United States Public Health Service

Latest public health estimates are that between 175,000 and 200,000 persons contact syphilis annually and that about five times that number become infected with gonorrhea In the United States at present, it was said, 3,000,000 persons are suffering from syphilis in some stage

Dr Leonard A Scheele, Surgeon General of the United States Public Health Service, in a press conference in New York City, disclosed that a series of fourteen radio transcriptions have been prepared for free distribution to radio stations throughout the United States

The transcriptions were prepared by the Columbia University radio program bureau for the Public Health Service Among the points emphasized by Dr Scheele and physicians associated with him in the Public Health Service were

That in most cases syphilis can be cured in eleven days, during which time the patient may continue his regular work, and that gonorrhea can often be cleared up by a single injection Before the development of penicillin, treatment of syphilis took about eighteen months and as a result only 20 per cent of the persons being treated completed the full course of treatments

The radio programs emphasize the danger to the community, individuals, and even to unborn children when venereal diseases are not treated

Participating in the press conference with Dr Scheele were Dr E Gurney Clark, professor of epidemiology, school of public health, Columbia University, Dr Theodore Bauer, in charge of the venereal disease section of the Public Health Service, and Dr C L Williams, chief of the Bureau of State Service of the Public Health Service

Officer Rank Open in ORC to Experts

CIVILIANS, possessing either professional or technical qualifications which are critically essential and immediately adaptable to the needs of the Army, may get direct appointments in the Officers' Reserve Corps, according to a new policy outlined in August by the Department of the Army

Commissioning of specialists is intended to provide a continuing source of officers experienced in fields in which it is not feasible or economical for the Army to give training The establishment of standards under the new policy now opens the way for those who previously applied for direct commission in specialist fields to resubmit their applications

Such specialties as medical and allied sciences, artwork, dietetics, dramatics, laundry and dry cleaning, various branches of engineering, motion picture production, printing, and submarine diving are included in a list of 75 varied fields

Men, as well as women, who may be commissioned under the program, will bring to the Army the value of their civilian training and will subsequently gain a knowledge of military procedures Individuals, without prior military service, will be required to meet, within a reasonable length of time, the minimum military-training requirements established to maintain a commission in the grade and section in which appointed, and in their mobilization assignment

In addition to specific schooling or experience in any of the above fields, applicants for direct appointments must be at least twenty-one years old, citizens of the United States by birth or naturalization, must have an Army intelligence score of 110 or higher, physically qualified, with some waivers, and at least a bachelor's degree Some special fields require only a high-school education or equivalent preparatory school education

Age maximums and educational or experience minimums are second lieutenants, thirty years with four years college or experience, first lieutenants, thirty-three years with seven years college or experience, captains, thirty-seven years with at least eleven years college or experience, majors, forty-five years, with at least sixteen years college or experience, lieutenant colonels, fifty-one years, with at least twenty-one years college or experience, and colonels, fifty-five years, with at least twenty-six years college or experience

In the First Army area, correspondence may be directed to the Headquarters, New York-New Jersey-Delaware Military District at 90 Church Street, New York City

Occupational Therapy Association Meets

MORE than 500 leaders in the field of occupational therapy, representing every section of the United States, participated in the 31st Annual Convention of the American Occupational Therapy Association at the Hotel Pennsylvania, in New York City, September 7 to 11 The Association has approximately 3,000 members professionally engaged in rehabilitation activities

Among the speakers presenting papers were Dr Howard Rusk, chairman of the Department of Rehabilitation and Physical Medicine, Bellevue-New York University College of Medicine, Mr Holland Hudson, director of the Rehabilitation Service, National Tuberculosis Association, Dr Luther Woodward, field consultant to the National Committee for Mental Hygiene, and Dr Leland E Hinsie, assistant director, New York State Psychiatric Institute

On September 10 and 11, a teaching Institute presented recent developments and technics in the treatment of neuropsychiatric conditions Various trips to hospitals and other institutions in New York City and surrounding areas, on September 9 and 10, were arranged for those attending the Convention

$77,600 in Grants Made for Sclerosis Research

THE National Multiple Sclerosis Society has made grants totalling $77 600 to five medical institutions to conduct medical research projects into the causes and control of multiple sclerosis it was announced in August by Ralph I Straus president of the Society The causes of this crippling disease, the No 1 neurologic problem of the present time which attacks the central nervous system and which incapacitates thousands of young people in the prime of life, are not known

Included in these grants is a fund to establish the second multiple sclerosis research clinic to be financed by the Society This clinic was opened at the Albany Hospital Albany New York. Neurologists of the Albany Medical College will cooperate with the Division of Research and Laboratories of the New York State Department of Health in conducting the research program at the clinic.

The largest of the grants for research will go to Tulane University School of Medicine New Orleans Louisiana to finance a three-year study of the possible relationship between virus infection and the process of demyelination which is characteristic of the disease in which the myelin or fatty sheath of the nerves is dissolved and replaced by sclerotic tissue During the progress of multiple sclerosis the nerve lesion becomes more severe and the resulting scar tissue eventually prevents the passage of nerve impulses A progressive paralysis results

What causes this damage to the central nervous system has thus far eluded medical science Clinical observation of demyelinating diseases in humans suggests the possibility that some relation may exist between virus infection and myelin destruction.

Another grant voted by the Society will go to the Massachusetts General Hospital, in Boston, Massachussets for a two-year project that will be devoted to basic research in myelin degradation Cedars of Lebanon Hospital Los Angeles California, received a grant for an investigation of the behavior of the blood-clotting mechanism in multiple sclerosis.

The fifth grant was made to the New York University School of Medicine for a study of psychological factors in multiple sclerosis Leading medical institutions in New York will cooperate.

The voting of grants for the above five medical research projects brings to seven the number of projects into the causes of multiple sclerosis which have been financed by the National Multiple Sclerosis Society with headquarters in the New York Academy of Medicine Building, New York City since its formation in October 1946 less than two years ago

In June 1947 a grant of $64,350 was made to Columbia University for a three-year study in the field of allergy The first multiple sclerosis research clinic of the Society was established in March 1948 in Boston Massachusetts as a joint project of the Beth Israel and Boston State Hospitals

Immunization High in Westchester

WESTCHESTER stands first among the counties of the State in percentage of preschool age children who have been immunized against diphtheria according to word received by Dr E A. Lane, head of the Communicable Diseases Division of the Westchester Health Department, from the State Department of Health

For years, Westchester has been in second place exceeded only by much smaller Columbia County Last year Columbia led with a mark of 83 per cent This year Westchester scored a mark of 87 per cent immunizations while Columbia dropped to 78 per cent

Health Commissioner William A Holla and Dr Lane expressed satisfaction with the progress that has been made in the immunization campaign, and pointed out the current mark is particularly significant as Westchester is listed as having more than 15 000 children in the group in the area excluding municipalities of over 10 000 population, a number exceeded only by Erie Nassau and Suffolk counties and more than seven times the estimated approximately 2,000 children in that group in Columbia.

Six Westchester municipalities of over 10,000 population in the county health district attained honor roll ranking Dr Lane said Such ranking is given if 70 per cent or more of the preage children have been immunized. The honor communities are Mamaroneck, Ossining Peekskill Port Chester Scarsdale and White Plains.

Society for Crippled to Hold November Meeting in Chicago

THE twenty-eighth annual convention of the National Society for Crippled Children & Adults Inc. will be held at the La Salle Hotel Chicago November 15 to 17

Many outstanding speakers in the fields of medicine health and education will be on hand to present facts on progress in work with the handicapped during the past year according to Lawrence J Linck executive director

The convention will be attended by physicians therapists educators workers with the handicapped and representatives of National Society's more than 2,000 state and local units throughout the United States Canada, Alaska, and Hawaii

Heart Association Grant to Szent Gyorgyi Foundation

THE American Heart Association has granted $25 000 to the Szent Gyorgyi Research Foundation Inc. for studies in muscular contraction regarded as basic to complete understanding of the heart muscle it has been announced by Dr Tinsley R Harrison association president The research grant is the first to be made by the association.

The studies are being conducted by Dr Albert Szent Gyorgyi physiologist and his associates at the Marine Biological Institute Woods Hole Mass. Dr Cyorgyi is a Nobel prize winner in physiology and medicine. He is director of research of the foundation bearing his name which was incorporated this year to aid scientific and educational research

Qualifications for Specialist's Rating in Preventive Medicine Announced

APPLICATIONS from armed forces medical officers who want to be certified as specialists of preventive medicine may now be submitted to the Interim Board of Preventive Medicine, according to Department of the Army Circular No 234, dated August 5, 1948 The circular also outlines the qualifications required of applicants, and lists the items to be included in the applications Written and oral examinations will be held during the fall of 1948 or the spring of 1949

The circular also announces that the first group of officers to be certified will include those selected by the board as having "considerable experience and a long record of distinguished service in responsible preventive medicine or public health positions" For this first group, former training and supervised experience requirements, as well as written examination, will be waived

Examinations and certification will be administered by the Interim Board of Preventive Medicine, formed early this year by joint action of the Surgeons General of the Army, Navy, and U S Public Health Service in anticipation of the formation of an American Specialty Board in this field by the Advisory Board for Medical Specialties of the American Medical Association

Prerequisite qualifications include, among other things, membership in the American Medical Association, graduation from a medical school and internship in a hospital approved by the Council of Medical Education and Hospitals of the American Medical Association, or by the Army and Navy, the degree of Master of Public Health or its equivalent, and both supervised experience and experience in a position of responsibility, in the field of public health or preventive medicine

Applications Received for Army Medical Resident Training Program

APPLICATIONS for the Military Resident Training Program (in Army general hospitals) are currently being received in the Office of the Surgeon General. Under this training program any physician who qualifies for and accepts a commission in the Regular Army Medical Corps will be given the opportunity of competing for an approved residency in the field of his choice

Medical specialty training available for newly commissioned officers under this program is as follows

1 A limited number of senior residencies in thoracic surgery, orthopedics, pulmonary diseases, pathology, ophthalmology, and physical medicine

2 A limited number of residencies in orthopedics, pathology, and physical medicine

3 A limited number of assistant residencies in obstetrics, urology, thoracic surgery, dermatology, and pediatrics Some of these assistant residencies in urology, general surgery, internal medicine, and radiology are available at the Gorgas Hospital, Canal Zone

4 A substantial number of assistant residencies in anesthesia, general surgery, orthopedics, internal medicine, psychiatry, pathology, ophthalmology, otolaryngology, radiology, physical medicine, and clinical physician training

Those officers who are not selected to enter residency training on January 1, 1949, or July 1, 1949, will, if qualified, be furnished a certificate indicating the date on which they will enter approved professional training The program is designed to insure that all qualified applicants will be given the opportunity of completing their requirements for certification by an American Specialty Board

October 1, 1949, has been established as the deadline for receipt of applications from physicians who are interested in participating in this training program

Complete information and application blanks for the program may be obtained by writing to the Surgeon General, Department of the Army, Washington 25, D C

Prize Offered for Obstetric and Gynecologic Paper

THE South Atlantic Association of Obstetricians and Gynecologists has announced the establishment of "The Foundation Prize" Authors of papers on obstetric and gynecologic subjects desiring to compete for the prize may obtain information and details concerning the prize from Dr E D Colvin, Secretary-Treasurer, 1259 Clifton Road, N E, Atlanta, Georgia

PERSONALITIES

Appointed

Dr Robert F Korns, Albany, as director of State Health Department's Bureau of Communicable Disease Control As chief of the tuberculosis control branch in Japan, with headquarters in Tokyo, Dr Melville D Dickenson, Geneva Dr Frank Dutra, pathologist of the Kettering Laboratory of Applied Physiology at the University of Cincinnati, Ohio, and pathologist for the coroner's office, Hamilton County, Ohio, as medical examiner for Westchester County As assistant medical examiner for Westchester County, Dr Andrew Eggston, Mount Vernon

Dr Gustav J Beck, Gloversville and New York City, as assistant in medicine on the faculty of Columbia University, College of Physicians and Surgeons Dr David L Cronin, New York City, to the staff of the Division of Clinical Research, Schering Corporation, Bloomfield and Union, New Jersey

COUNTY NEWS

Allegany County

Dr Charles LeRoy Steinberg, senior visiting physician and physician-in-charge of the Arthritis Clinic, Rochester General Hospital, addressed the Allegany County Medical Society on September 9 at the Bolivar Country Club Bolivar Dr Steinberg's subject was "Chronic Arthritis—Its Diagnosis and Management.

This postgraduate instruction was arranged by the Medical Society of the State of New York with the cooperation of the New York State Department of Health

Bronx County

New officers assumed office in the Bronx County Medical Society on July 1 and will continue in office until June 30 1949 They are president Dr Renato J Azzari president-elect Dr Henry J Barrow, vice-president, Dr Abraham Tamis secretary, Dr Goodlatte B Gilmore, treasurer Dr Charles W Frank editor of the *Bulletin* Dr Philip Eichler chairman, public relations committee Dr George Schwartz chairman legislation committee Dr James A. Lynch chairman, public health committee, Dr Joseph Golomb chairman, medical economics committee Dr Thomas McCarthy

Franklin County

Free chest x rays were available to all adult residents of Franklin County during four days of the Malone Fair in August according to an announcement by Executive Secretary Virgie Lee Smith of the Franklin County Tuberculosis and Public Health Association. The project was endorsed by the Medical Society of the County of Franklin

Fulton County

Dr D Philip McGuire, Johnstown and New York City, read a paper on medical technic to members of the Fulton County Medical Society on August 11 at a luncheon meeting at the Saratoga Country Club Dr McGuire has recently returned from Europe, where he made a study of medical and surgical practices

Madison County

The summer meeting of the Madison County Medical Society was held on August 19 at the home of Dr and Mrs. Milton R. Joy in Cazenovia After the business meeting speakers were Dr T Wood Clarke, Utica, whose subject was Champlain's Invasion of New York State and the Battle of Nichol's Pond, and Dr Lee S. Preston Oneida, speaking on 'The Founding and Early Days of the Madison County Medical Society

Monroe County

A program for closer cooperation between the Monroe County Medical Society and the Rochester Chapter of the American Red Cross in operation of the Rochester Regional Blood Program has been agreed upon That was revealed in a joint announcement by Dr Ellis B Soble medical society president, and Thomas R. White chairman of the regional blood program.

Principal points in the program call for adequate representation of the Monroe County Medical Society on the executive board of the blood program and for enlargement of the society's blood bank committee which is to have direct supervision over 'all affairs pertinent to the medical and technical operations of the program.'

Present members of this committee are Dr Herbert R. Brown Jr medical director of the blood program Dr Earle B Mahoney and Dr Walter S Thomas. Three more members of the group will be appointed in the near future Dr Soble said

The new program, Dr Soble pointed out follows recommendations made by the American Medical Association at its recent convention in Chicago

Nassau County

A mobile chest x ray unit and its staff of technicians from the State Department of Health made free x-ray examinations of visitors fifteen years of age and older at the Mineola Fair on September 14 to 18 The Medical Society of Nassau County and its Woman's Auxiliary participated in the health exhibit at the fair

Orange County

Postgraduate instruction has been arranged for the Orange County Medical Society to be given on Tuesday evenings at 8.30 P.M. at the Court House Goshen On September 28 Dr Henry D Diamond clinical assistant physician at Memorial Hospital New York City, will speak on 'The Significance of Enlarged Lymph Nodes.

The scheduled November lectures are by Dr A H Aaron clinical professor of medicine, University of Buffalo School of Medicine, Buffalo whose subject on November 9 will be "The Evaluation of the Common Drugs in General Practice, and by Dr H S Weichsel, compensation medical examiner New York State Workmen's Compensation Board State Department of Labor, New York City, on November 23 speaking on 'Trauma and Peripheral Vascular Disease.

On September 14 Dr Charles L Fox, Jr assistant professor of bacteriology, College of Physicians and Surgeons, Columbia University New York City spoke on Electrolytes in Shock in Relation to Blood and Plasma Therapy These instructions were provided by the Medical Society of the State of New York in cooperation with the State Department of Health.

Otsego County

Neurology in General Practice was the subject of the lecture given by Dr Wardner D Ayer professor emeritus of clinical medicine at Syracuse University College of Medicine to members of the Otsego County Medical Society on September 1 at the Oneonta Country Club This postgraduate instruction was arranged by the Medical Society of the State of New York with the cooperation of the State Department of Health

Richmond County

On Wednesday evening, October 13, at 9.30 P.M., Dr Linn J Boyd director of medicine New York Medical College, Flower and Fifth Avenue Hospitals, New York City will speak to members of the Richmond County Medical Society on the subject of 'Pulmonary Embolism. The meeting will be held at the Old Mill Hyland Boulevard Staten Island.

The lecture was arranged by the Council Com

mittee on Public Health and Education of the Medical Society of the State of New York with the cooperation of the State Department of Health

New chairmen of committees of the Richmond County Medical Society have recently taken office and will serve until June, 1949 They are Dr M Werner, economics, Dr H A. Cochrane, blood bank, Dr Milton S Lloyd, insurance, Dr D V Catalano, maternal and child welfare, Dr Oscar Auerbach, nominating, Dr Jacob J Silverman, publishing, Dr Joseph F Worthen, public relations, Dr E Fieramosca, pharmaceutical and public health committees, Dr John J Goller, legislative, Dr Joseph V D'Agostine, compensation, Dr Charles Reigi, industrial, Dr M D Radding, cancer, and Dr Edward H Robitzek, tuberculosis

Rockland County

Vitamins donated by Lederle Laboratories were shipped in August, in the name of the Rockland County Medical Society, to Echternach in Luxembourg The program was arranged by the Boy Scouts in Rockland Dr John C Dingman, Spring Valley, is president of the County Boy Scout Council The community of Echternach, Dr Dingman said, was pillaged by German occupation troops during the war

Steuben County

"Recent Developments in Diseases of the Liver" was the subject of Dr Jacob D Goldstein, assistant professor of medicine and bacteriology, University of Rochester School of Medicine and Dentistry, Rochester, who spoke to members of the Steuben County Medical Society on September 9 The instruction, which was held at the Hotel Sherwood in Hornell, was arranged by the Council Committee on Public Health and Education of the Medical Society of the State of New York with the cooperation of the State Department of Health

Sullivan County

Dr Irl H Blaisdell, clinical associate professor of otolaryngology at Syracuse University College of Medicine, Syracuse, will speak on the subject of "The Problem of Carcinoma of the Larynx" on Wednesday evening October 20, at 8 30 P M This postgraduate instruction, arranged for the Sullivan County Medical Society by the Medical Society of the State of New York with the cooperation of the State Department of Health, will be held at the Lenape Hotel, Liberty

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U S PUBLIC HEALTH EXPERTS TO AID U N FIGHT AGAINST TUBERCULOSIS

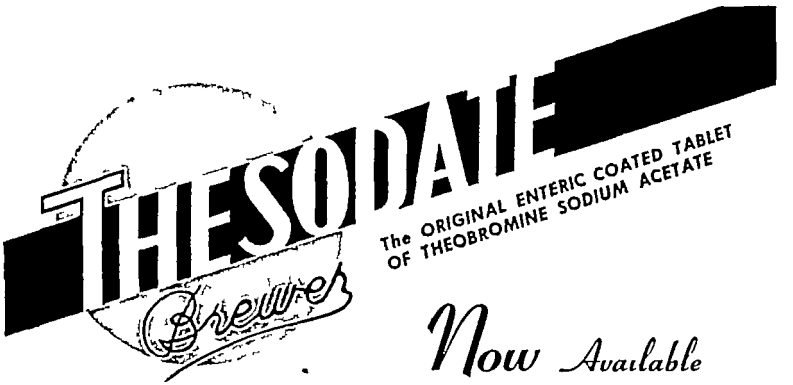
Two tuberculosis experts from the U S Public Health Office, Dr Carroll Palmer and Dr Lydia Edwards, are to join the international staff now engaged in the antituberculosis vaccination program of the United Nations, it was announced in August by the United Nations International Children's Emergency Fund They will leave shortly for Copenhagen, where they will work in the State Serum Institute on the research end of the undertaking

This vaccination project, which is a joint enterprise of the Children's Fund, the World Health Organization, and the Danish Red Cross and its Scandinavian associates under the direction of Dr Johannes Holm of Denmark, is the largest mass immunization ever undertaken It calls for the testing of between 40 and 50 million children in Europe alone, and the vaccination of all found uninfected Plans are also being made for setting up similar programs in Algeria, Morocco, Tunisia, and in China. Further extension of the programs to countries in Southeast Asia and in Latin America is contemplated For this enterprise a total of $4,000,000 has already been allocated by the Children's Fund, and by early fall the testing and inoculation will be underway in a number of European countries

The vaccine to be used is BCG (Baccillus Calmette Guerin), named for the two French scientists who began work on it in 1908 It was first used for child vaccination in 1923 Since then it has become widely accepted as an effective protective measure in a number of European countries

The two United States specialists will work on setting up studies for the purpose of measuring the effectiveness of the vaccine Millions of records will be gathered which, it is predicted, will form the basis of one of the greatest epidemiological studies ever made Unusual interest is attached because it is work made possible only because there is such an organization as the United Nations through which the undertaking can be developed and carried out on a world-wide scale

Dr Palmer has been with the research office of the tuberculosis control unit of the U S Public Health Service since its organization five years ago Dr Edwards has also spent a good part of her professional career in the tuberculosis field Prior to joining the health service, she was in charge of the children's tuberculosis clinic in Johns Hopkins University in Baltimore Immediately after the war she was with the United Nations Relief and Rehabilitation Administration in Czechoslovakia



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CORRESPONDENCE

Clot Dissolution During Dicumerol Therapy

To the Editor

In their syndicated column which appears in the *Long Island Press*, Hubbard and Isabella Hoover entertainingly discuss the use of dicumerol which Mr Hubbard had received during hospital treatment for a "blood clot" In light of some extravagant newspaper publicity given this so-called "miracle worker," Mr Hubbard's readable and intelligent lay description is refreshing He mentions that, while some doctors feel that dicumerol "dissolves" the clot, others "more conservative" say that it will merely prevent clot accretion or the formation of new ones

That these alternative cases are moot is proved by the emphatic denial with which most physicians, even authorities on anticoagulant therapy, greet the former case The descriptive literature on dicumerol also stresses that clots are not dissolved, and this several years after Swedish investigators (pioneers in anticoagulant therapy) appear to have accepted clot dissolution during such therapy as a fact And as a matter of this fact, the possibility of physiologic intravascular clot dissolution must be known to any physician doing extensive intravenous injections, who occasionally thromboses a vein with a drug like mercuripurin and finds feasible re-entry of the same vein and a fluid current therein, 24 to 48 hours later Progressive theories of the nature and mechanism of physiologic coagulation call for the probability that continuous fibrin formation and fibrinolysis are occurring within the vascular system of the healthy organism In such an organism, restoration in the continuity of thrombosed channels probably does not await the classic pathology textbook sequence of clot organization, capillary budding, and endothelial coring The pathologic evidence for the physiologic sequence does not exist simply because cases of successful vascular channel restoration through fibrinolysis do not so often come to autopsy

There is, however, some strong additional evidence for the case for fibrinolysis Following the administration of dicumerol, about one third of the subjects studied in a recent series show a rapid spontaneous liquefaction of the prothrombin-time-determination clot as it is formed in the test tube if the prothrombin-time-determination reaction mixture is kept at body temperature for a few hours Photographs of this liquefaction were recently published in another connection (J Am Pharm, A 36 225 (Aug) 1947)

The rapidity of clot liquefaction after dicumerol administration does not exactly parallel the fall in prothrombin concentration and may be conditioned by the autochthonous relative hyperheparinemia which some dicumerolized patients exhibit The fibrinolysis phenomenon seems to coincide with the rate of clinical response, the latter again is frequently too rapid to be accounted for on the basis of the slow pathologic sequence of organization-recanalization

An appreciation of the distinct possibility of rapid clot dissolution through the agency of dicumerol therapy would appear to be essential to the intelligent exploitation of such therapy

ROBERT D BARNARD, M D
565-1st Street, Brooklyn

May 15, 1948

The American Academy of Pediatrics

To the Editor

On page 1276 of the June 1 issue of the JOURNAL there appears an item which reflects a misquotation which originated in the *Washington Post*, March 14, and which gives a false impression of the views of the American Academy of Pediatrics in relation to the American Medical Association and socialized medicine In order that your readers may be correctly informed may I set forth the facts of the matter as follows

On March 11 I appeared before the Health Subcommittee of the Senate Committee on Labor and Public Welfare to testify on the School Health Services Bill (S 1290) at the request of Senator Smith, chairman of the subcommittee, and Senator Saltonstall, sponsor of the bill In particular, I was requested to review some of the pertinent findings of the Academy of Pediatrics' Study of Child Health Services In reference to the terms of the bill which provide for treatment of defects and conditions found in school health examinations, the following statement was made which now appears in the printed official record of the hearing "The Academy is on record as approving the provision of medical services to those unable to pay for such services But the Academy is vigorously opposed to any program in which federal funds are used to provide medical treatment for those who are able to take care of themselves"

In commenting upon this testimony, the *Washington Post* attributed to me the following statement which I did not make and for which there was no foundation "Not all of us share the American Medical Association's philosophy of fear of socialized medicine"

The *Washington Post* misquotation was picked up by Dr Marjorie Shearon in her news bulletin on medical legislation Dr Shearon was advised of the error and made a generous apology in her bulletin under date of April 2, 1948 She stated, "In my release for March 19 I referred to the testimony given by Dr John Hubbard for the Senate Health Subcommittee and to a feature article which appeared in the *Washington Post* in which Dr Hubbard was quoted as saying that the American Academy of Pediatrics does not fear socialized medicine

[Continued on page 2076]



WHEN *Anorexia* POSES SPECIAL PROBLEMS

Periods of anorexia following infectious disease and surgery can readily produce a series of consequences detrimental to the patient (a) curtailed food consumption (b) further deterioration of the nutritional state and (c) impeded recovery

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IRON	12.0 mg	COPPER	0.50 mg

*Based on average reported values for milk.

[Continued from page 2074]

in the same way the American Medical Association does The article in other respects conformed with the testimony given by Dr Hubbard at the Senate hearing However, with respect to the paragraph on socialized medicine, I am informed by Dr Hubbard that the *Post* reporter misquoted him That being the case, I hasten to apologize to the American Academy and to Dr Hubbard for having published the paragraph regarding socialized medicine and federal subsidy which I now learn was not wholly accurate "

JOHN P HUBBARD, M D
Director, Study of Child
Health Services
American Academy of Pediatrics

July 3, 1948

Augmented Unipolar Leads

To the Editor

I should like to call the attention of your readers to an inaccuracy which appeared in the paper of Lieberson and Goldbloom, NEW YORK STATE JOURNAL OF MEDICINE, July 1, 1948, page 1467

The augmented unipolar extremity leads, aVL, aVR, and aVF, which they use in their device were invented by me in 1942 (Am Heart J 23 483, 1942), and for them to call them "augmented limb leads of Wilson" is misleading In the above paper I pointed out that these augmented limb leads could be obtained using an indifferent electrode of zero potential of the Wilson type, or the indifferent electrode which I also invented

I also devised the terms, aVL, aVR, and aVF, to differentiate the augmented unipolar extremity leads from the ordinary unipolar extremity leads of Wilson, which are called VL, VR, and VF

EMANUEL GOLDBERGER, M D
111 East 61st Street
New York City

July 12, 1948

To the Editor

We called the augmented unipolar limb lead obtained with the apparatus "augmented limb leads of Wilson" not to ignore any of the substantial contributions Goldberger made in this field, but rather to indicate that the indifferent electrode of zero potential used in the apparatus is of the Wilson type with balanced resistances rather than the type suggested by Goldberger without resistances

Goldberger's statement that the augmented limb leads obtained using the Wilson type of indifferent electrode is the same as those obtained with the indifferent electrode he proposed is questionable and is undergoing investigation at present Bruno Kisch, for instance, concludes from some interesting experiments which he conducted recently that Goldberger's augmented unipolar limb leads are not in accordance with the concept of unipolar electrocardiography, since the "zero potential" against which the a-V leads are taken is different for each extremity of the same person (Exper Med & Surg 4 1 (February) 1948) It is therefore understandable that in designing an apparatus to take augmented limb leads the method of Wilson with paired resistance was used rather than Goldberger's

ABRAHAM LIEBERSON, M D
237 East 20th Street
New York City

August 12, 1948

SURGICAL TREATMENT OF INTRACTABLE ASCITES DESCRIBED

The surgical treatment of intractable ascites by the intramuscular peritoneal drainage operation was described by Dr Jere W Lord, New York City, at a meeting of the Academy of Medicine

There are three important physiopathologic states which lead to the formation of ascites The first and most frequently observed one is cirrhosis of the liver The second cause is the implantation of a malignant neoplasm of the peritoneum usually secondary to carcinoma of the gastrointestinal tract or the ovary, but occasionally the neoplasm is primary such as a mesothelioma The third is cirrhosis of the liver due to repeated and longstanding congestive heart failure

There is a significant group in which the ascites is intractable and will not respond to the best management requiring repeated paracenteses for relief In patients with cirrhosis of the liver, whatever the etiology, not only is this a tedious and painful procedure but, of greater importance, the prolonged loss of protein often leads to cachexia and death. Similarly, the control of ascites secondary to malignant peritoneal implants clouds the last weeks and months of many of these patients, although in other respects they may be fairly comfortable

An operative procedure has been devised wherein the ascitic fluid is enabled to flow through the lumen of a glass button into a large subcutaneous pocket, the deeper aspect of which is formed by the muscles of the abdominal wall Exposure of these muscles to the ascitic fluid is brought about by wide resection of the overlying deep fascia Hence, the fluid is absorbed continuously by means of the lymphatics in the muscles

Eight patients with intractable ascites have been operated upon by the procedure outlined above The results have been as follows complete subsidence of ascites in four patients, persistence of the ascites to a very mild degree without need for further paracenteses in two patients, failure in one patient and one patient died two weeks postoperatively from massive hemorrhage

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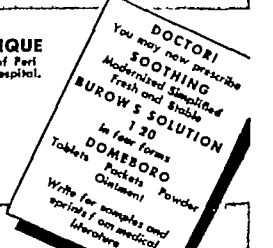
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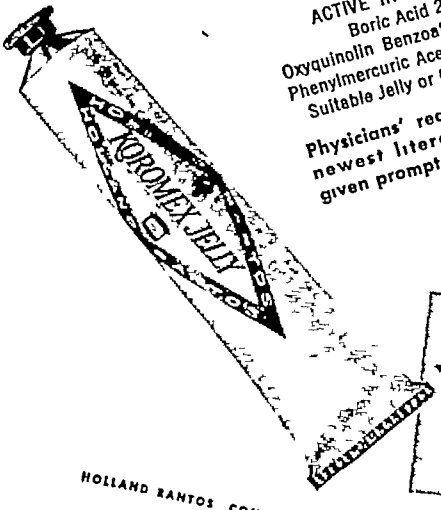


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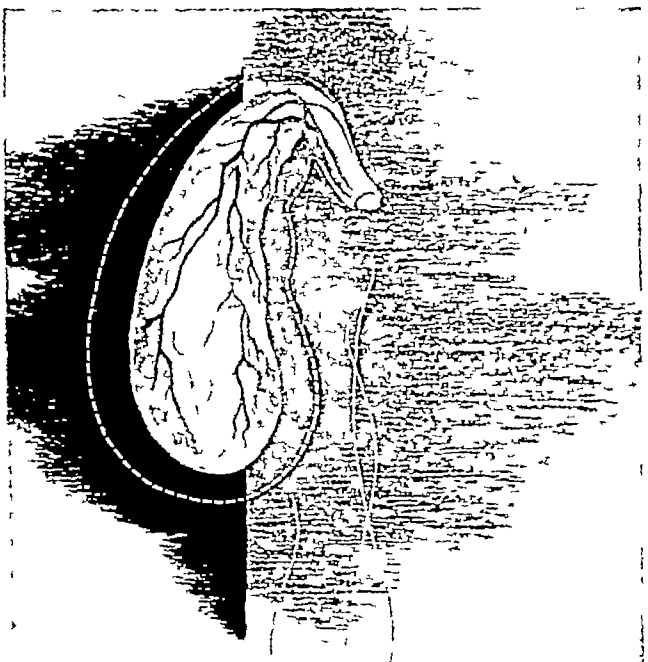
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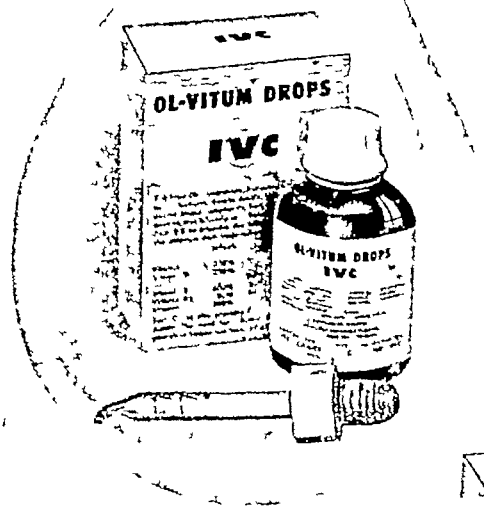


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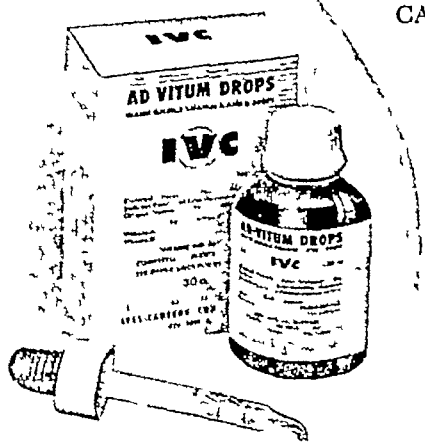
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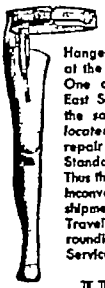
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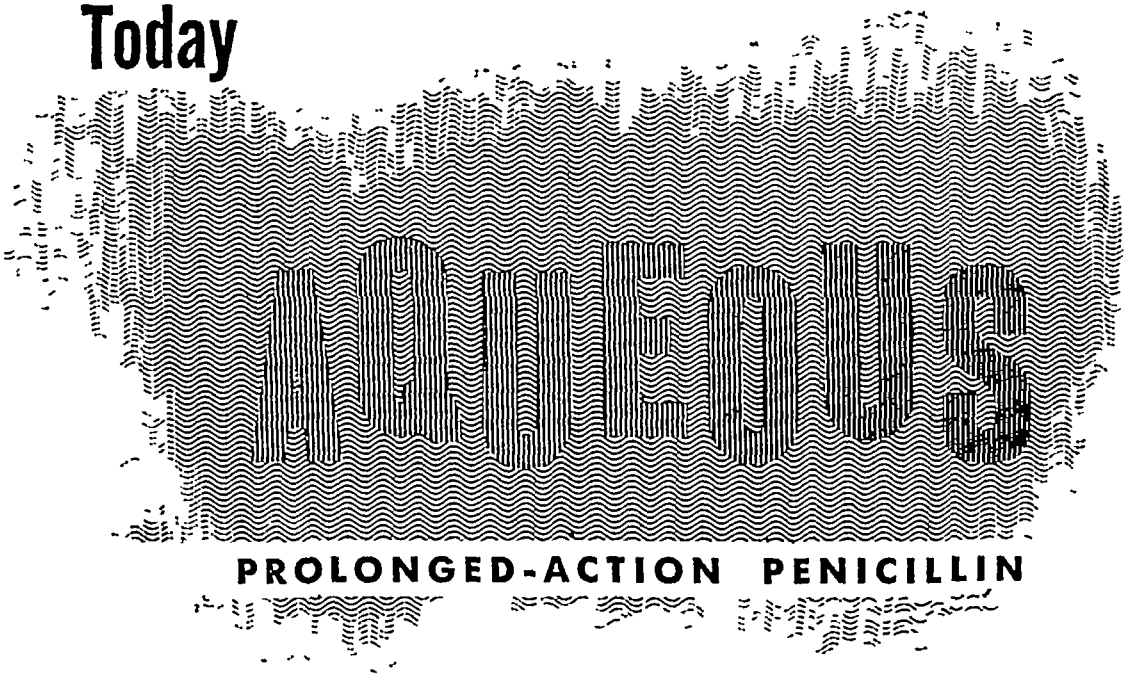
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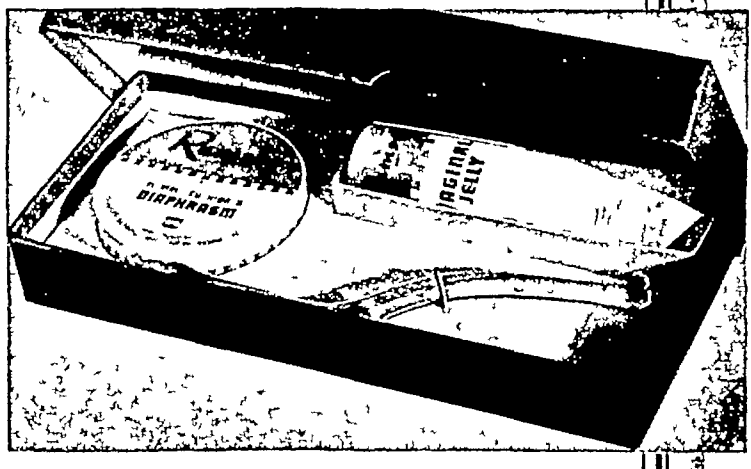
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1. Grinnell, E.: Journal-Lancet 68: 121 (Apr.) 1948

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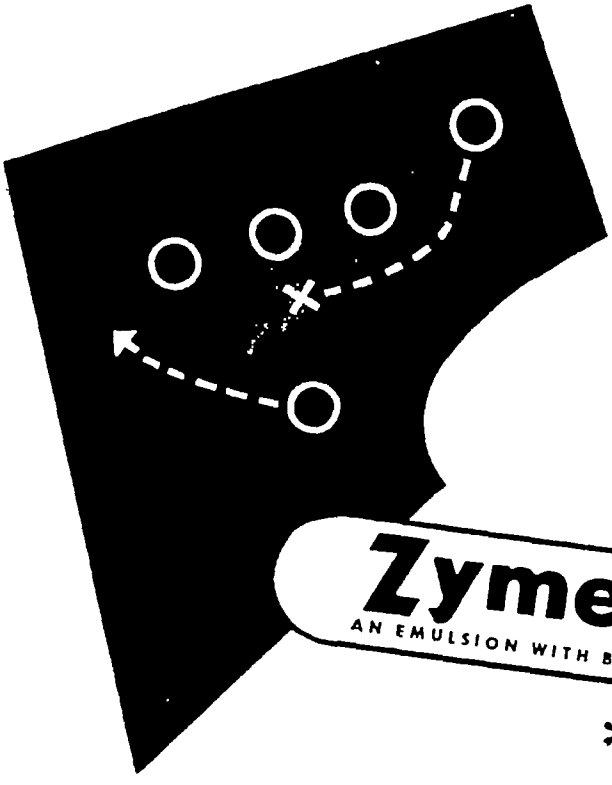
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CONTENTS

SCIENTIFIC ARTICLES

Tropical Diseases of the Gastrointestinal Tract in Veterans, *Howard B Shookhoff, M D* 2133
Pilonidal Cyst, *John C M Brust, M D*, and *Joseph B Sarner, M D* 2138
Diagnosis and Treatment of Colon Polyps, *George E Binkley, M D* 2145
Radical Operations on the Head of the Pancreas, *William Barclay Parsons, M D* 2149
The Role of the Vagus Nerves in the Medical and Surgical Therapy of Peptic Ulcer, *Asher Winkelstein, M D* 2153
The Constitutional Approach to Medicine, *Ian P Stevenson, M D* 2156
Potentialities and Limitations of Corrective Rhinoplasty, *Leroy S Safian, M D* 2160
Phenylethylhydantoin in the Treatment of Sydenham s Chorea, *Thomas Rogers Kirk, M D* 2165

(*Continued on page 2100*)



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(CONTENTS—Continued from page 2098)

The Accident-prone Patient, *Marion Norris Gleason* 2168

CASE REPORTS

Diphtheria Infection of the Skin of the Feet, *Walter C Levy, M D* 2171
Gangrene of the Hand Following Traumatic Occlusion of the Radial and Ulnar Arteries, *Robert L Nach, M D*, and *Herman Lohman, M D* 2173

EDITORIALS

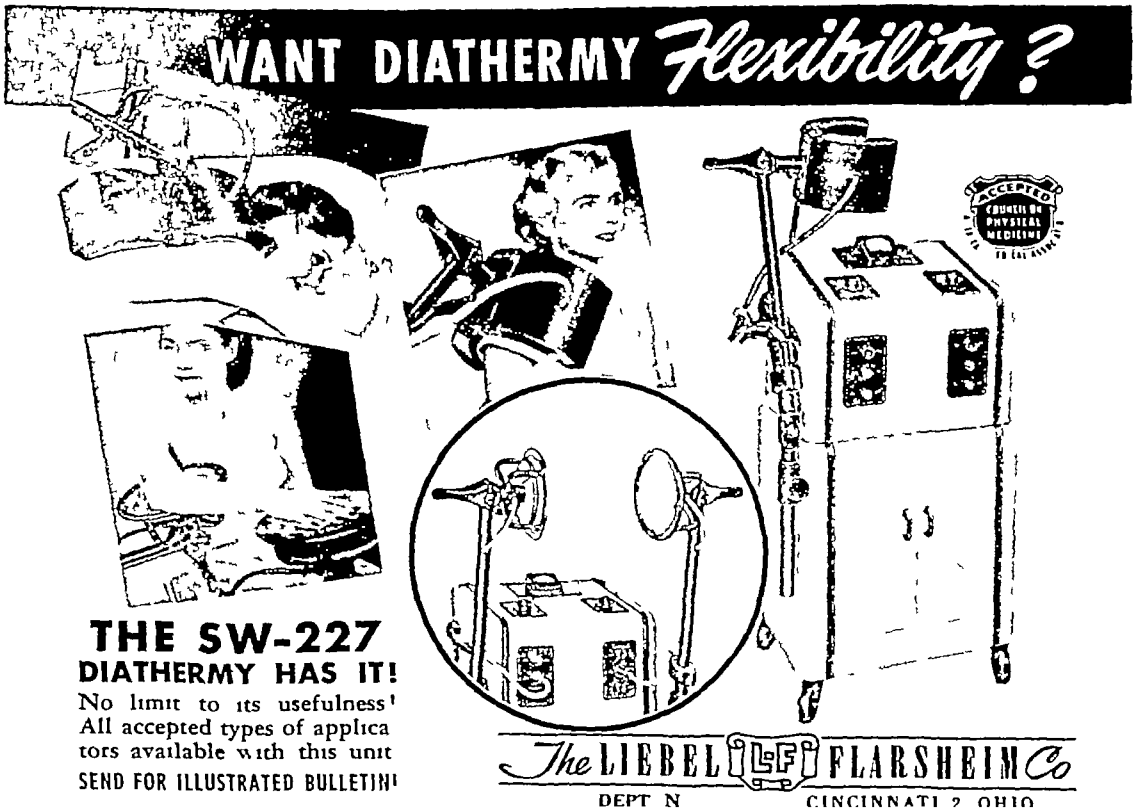
Modern Nutrition 2127
The Menace of the Antivivisectionists 2127
Current Editorial Comment 2129
Facts about Nutrition 2131

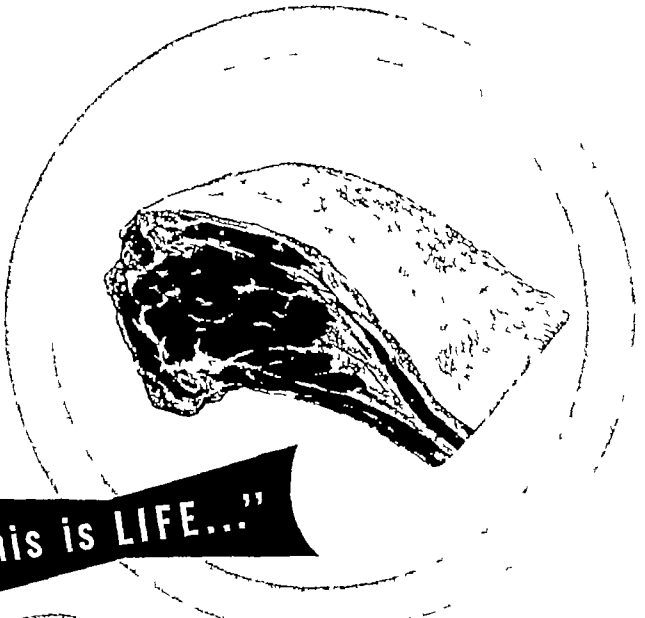
GENERAL FEATURES

Necrology 2175
Medical News 2176
Hospital News 2179
District Branches 2182

MISCELLANEOUS

Abstract of Minutes of the Council 2184
State Society Officers 2102, 2104, 2106
County Society Officers 2204





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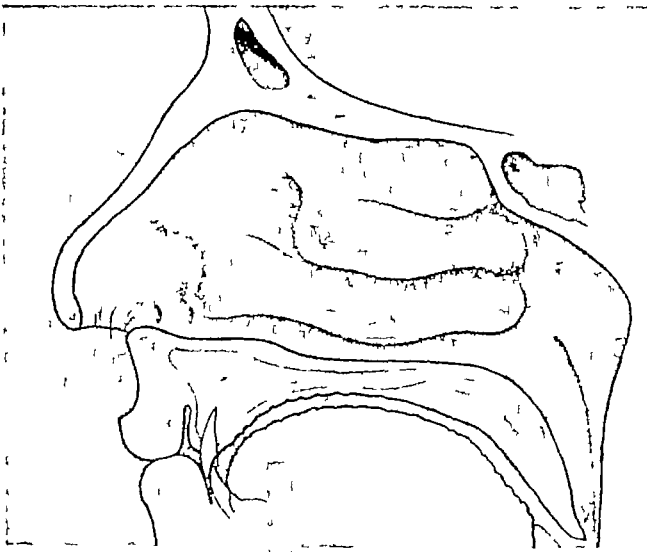
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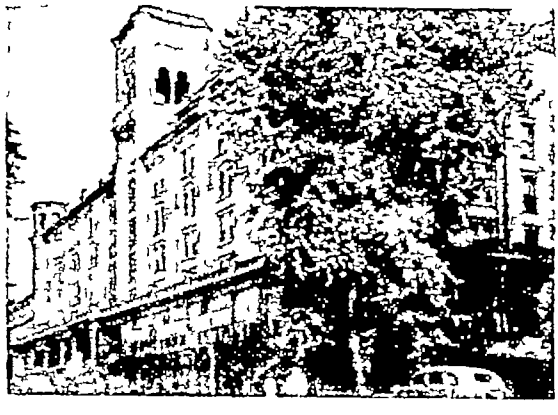
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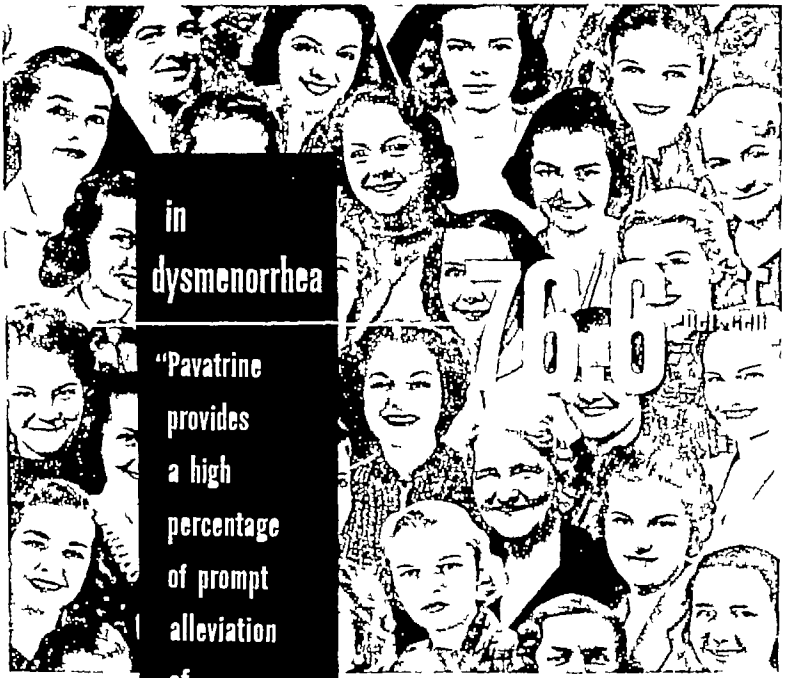
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INDEX TO ADVERTISERS

Abbott Laboratories		2119
The Alkalol Company		2203
American Hospital Supply Corporation		2101
The Arlington Chemical Company		2122
A C Barnes Company		2118
Dr Barnes Sanitarium		2199
Bilhuber-Knoll Corp		2106
Boast & Haggerty		2112
Brigham Hall Hospital		2201
Bristol Laboratories Inc		2191
Brown s Medical Bureau		2201
Brunswick Home		2199
Ciba Pharmaceutical Products Inc	2nd cover	2113
Clifton Springs Sanitarium and Clinic		2104
Commercial Solvents Corporation		2109
Conti Products Corp		2096
The De Leoton Company		2122
Doak Co Inc.		2122
Eaton Laboratories Inc		2107
Falkirk in the Ramapos		2199
Otis D Glidden & Co Inc		2098
Grant Chemical Co Inc		2107
Halcyon Rest		2201
Hoffmann-La Roche Inc		2125
Holbrook Manor		2199
Homemakers Products Corporation		2121
Hynson, Westcott & Dunning Inc		2108
Interpines		2199
Lanteen Medical Laboratories Inc		2195
The Liebel-Flarsheim Co		2100
Eli Lilly and Company	Between 2126-2127	
Louden-Knickerbocker Hall Inc		2201
Mandl School		2203
The Maples Inc		2201
Massapequa Villa		2199
Mead Johnson & Company	4th cover	
National Discount & Audit Co		2203
The Nitchie School of Lip Reading Inc		2203
Olympic Mfg Co		2201
Paine Hall		2203
Pinewood		2201
A M Radio Sales Co		2112
Raymer Pharmacal Company		2124
R J Reynolds Tobacco Company		2097
J B Roerig and Company		2099
Schenley Laboratories Inc		2116
Schering Corporation		2115
G D Searle & Co		2105
Sharp & Dohme		2126
Smith Kline & French Laboratories	3rd cover 2111 2123	2193
Standard Pharmaceutical Co Inc		2102
Marvin R Thompson Inc		2117
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Upjohn Company		2120
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Wallace Laboratories Inc		2096
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The Zemmer Company		2203

To forestall this eventuality



C S C Syrup CHOLINE BICARBONATE

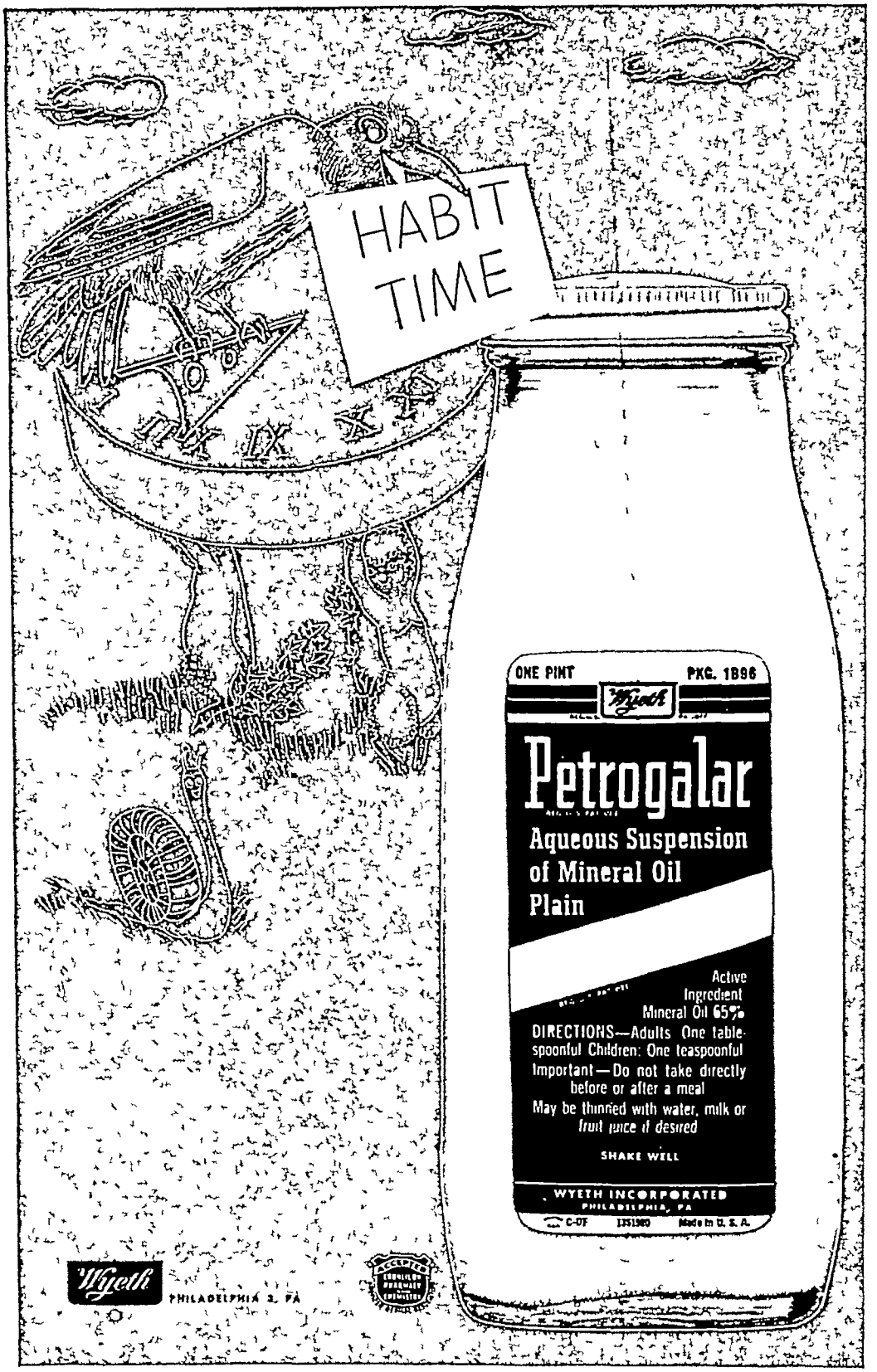
When instituted early and in conjunction with a diet providing large amounts of protein and B complex vitamins, Choline therapy interrupts the chain of events in the development of portal cirrhosis. Thus fatty infiltration of the liver, the forerunner of cirrhosis, is overcome, and the fatal complicating cirrhosis is either forestalled or prevented.

Syrup Choline Bicarbonate C S C, an entirely new choline preparation for therapeutic use, is an advantageous means of administering choline. It is an unusually palatable mixture, provides the equivalent of 12.5 per cent choline base or 14.4 per cent choline chloride, and may be given in full therapeutic dosage without gastric intolerance or nausea.

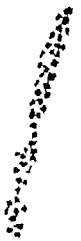
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C.S.C. Pharmaceuticals

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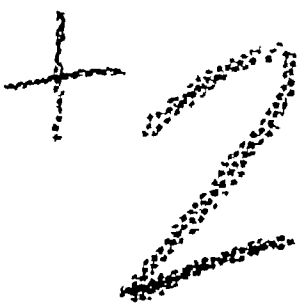

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Aqueous Suspension of Mineral Oil Plain
Active Ingredient
Mineral Oil 65%
DIRECTIONS—Adults One tablespoonful Children: One teaspoonful
Important—Do not take directly before or after a meal
May be thinned with water, milk or fruit juice if desired
SHAKE WELL
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Made in U. S. A.
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This penicillin-vasoconstrictor combination provides—



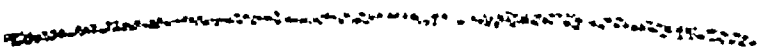
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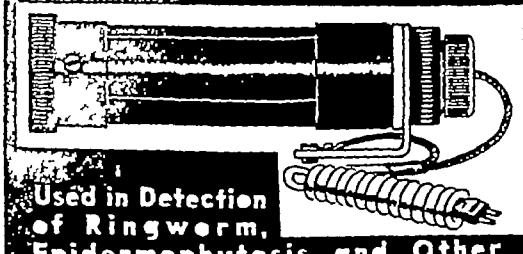
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INDEX TO ADVERTISED PRODUCTS

Agarol (William R Warner & Co, Inc) 2206
Alkalol (The Alkalol Company) 2203
Aluminum Penicillin (Hynson, Westcott & Dunning, Inc) 2108
Argypulvis (A C Barnes Company) 2118
Baxter Solutions (American Hospital Supply Corporation) 2101
Biogels (Bristol Laboratories Inc) 2191
Caminoids (The Arlington Chemical Company) 2122
Coramine (Ciba Pharmaceutical Products, Inc) 2nd cover
Dryamin (Abbott Laboratories) 2119
des (Grant Chemical Co, Inc) 2107
Dexedrine Sulfate (Smith, Kline & French Labs) 2193
Diaparene (Homemakers' Products Corporation) 2121
Eskadrazine (Smith, Kline & French Labs) 2123
Eskaphen B Elixir (Smith, Kline & French Labs) 3rd cover
Furacin Soluble Dressing (Eaton Laboratories, Inc) 2197
Intraderm Tyrothricin (Wallace Laboratories, Inc) 2095
Metrazol (Bilhuber-Knoll Corp) 2106
Mulsavite (Sharp & Dohme) 2126
Neo-Synephrine (Winthrop-Stearns Inc) 2103
Nucarpon (Standard Pharmaceutical Co, Inc.) 2102
Obron (J B Roerig and Company) 2099
Oleum Percomorphum (Mead Johnson & Company) 4th cover
Olhodin (The De Leoton Company) 2122
Oreton (Schering Corporation) 2115
Pavatrine (G D Searle & Co) 2105
Par-Pen (Smith Kline & French Labs) 2111
Pelvicins (Schenley Laboratories Inc) 2116
Petrogalar (Wyeth Incorporated) 2110
Priscol (Ciba Pharmaceutical Products, Inc) 2113
Raysal with Succinate (Raymer Pharmacal Company) 2124
Salmidol (Doak Co, Inc) 2122
Syrup Choline Bicarbonate (Commercial Solvents Corporation) 2109
Syrup Urethane-MRT (Marvin R Thompson, Inc) 2117
Vi-Penta Drops (Hoffmann-La Roche Inc) 2125
Zymadrops (Upjohn Company) 2120
Zymenol (Otis E Glidden & Co, Inc) 2098

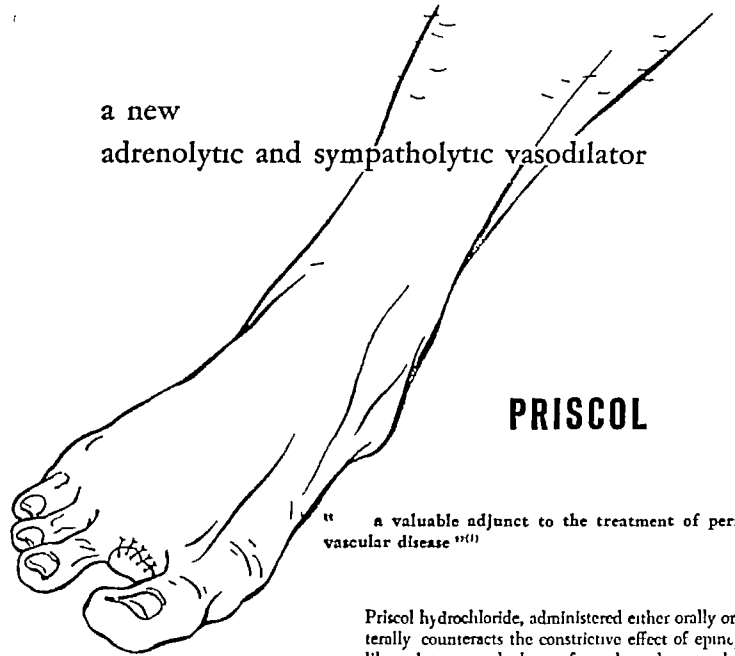
Medical and Surgical Supplies

Aerosol Mask (Vaponefrin Company) 2114
Black Light (A M Radio Sales Co) 2112
Colonic Portable Device (Olympic Mfg Co) 2201
Diathermy Apparatus (The Liebel-Flarsheim Co) 2100
Flat Spring Diaphragm (Lanteen Medical Laboratories, Inc) 2195

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" a valuable adjunct to the treatment of peripheral vascular disease "[1]

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1 Grimson, K. S., Moretti, F. A., Reardon, M. J. and Hendrix, J. P.: Surg. 31:728. 948.

• Complete information may be obtained from

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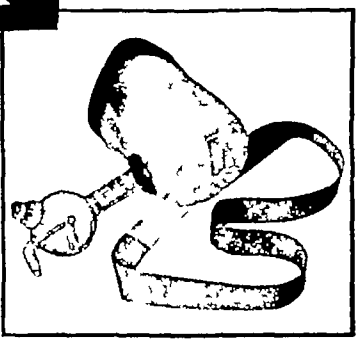
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in the male climacteric

"Testosterone is beneficial in the same manner as the estrogenic substances in the treatment of similar symptoms in the female"

United States Dispensatory ed. 24 Philadelphia, J B Lippincott Company 1947 p 1191.

"The objective in treatment, which is substitutive, is to assist in establishing endocrine and autonomic nervous system balance"

1947 Year Book of General Therapeutics, Chicago, The Year Book Publishers, Inc., 1947 p. 258.

ORETON

(TESTOSTERONE PROPIONATE U.S.P. XIII)

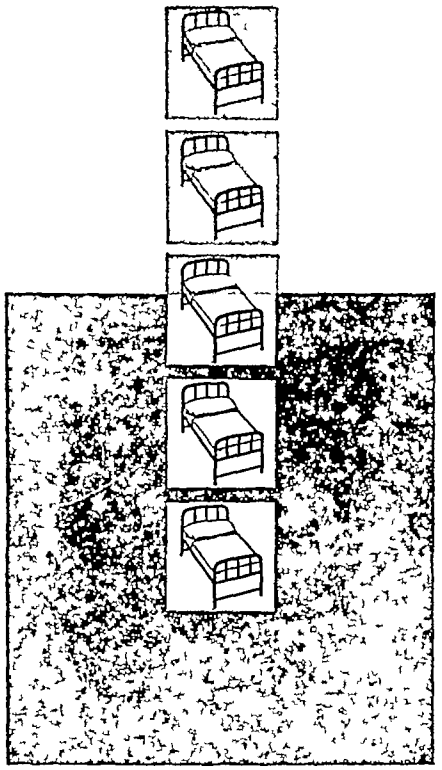
in oil relieves the distressing accompaniments of waning gonadal function in the male. High potency, rapid action and well sustained androgenic effect facilitate control of nervousness, irritability, despondency, fatigability, palpitations, hot flashes and other symptoms of the male climacteric. ORETON* fosters maintenance of emotional equilibrium and physical and mental vigor.

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[penicillin vaginal suppositories Schenley]

In a recent controlled study [1] of 1,573 obstetrical patients, the incidence of genital tract infections was reduced from 5 3 per cent to 2 3 per cent when penicillin vaginal suppositories were used *A decline of 56 6 per cent!*

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SIMPLICITY OF TECHNIQUE Insert 2 PELVICINS (total, 200,000 units of penicillin) into posterior fornix of vagina with a sponge forceps, immediately after delivery of the placenta

SUPPLIED Boxes of 6 and 12 PELVICINS, 100,000 units each

1 Pierce, R. R.: Am J Obst. & Gynec. vol. 55 (Feb.) 1948.

*Exclusive trademark. © Schenley Laboratories, Inc.

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PRICE REDUCTION PELVICINS now cost your patients one-third less



a new approach to the cough problem

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(an original MRT contribution)

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SYRUP URETHANE-MRT IS EFFECTIVE because its action is direct – similar to that of codeine – but derived entirely from urethane, which by suppressing the overactive cough reflex provides speedy comfort rest and relief

SYRUP URETHANE-MRT IS SAFE because unlike codeine its hypnotic and/or sedative properties are negligible Moreover the active drug urethane is non habit forming – non toxic Containing no alcohol it is ideal for children, non-constipating and causes no gastric discomfort.

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SYRUP URETHANE-MRT IS PLEASANT because it has a delightful taste and is pleasantly aromatic. Its emerald green hue gives it eye-appeal as well

Each teaspoonful (5 cc.) contains Urethane 4 Gr., in a flavored syrup base.

Directions One teaspoonful every 3 or 4 hours or as directed by the physician

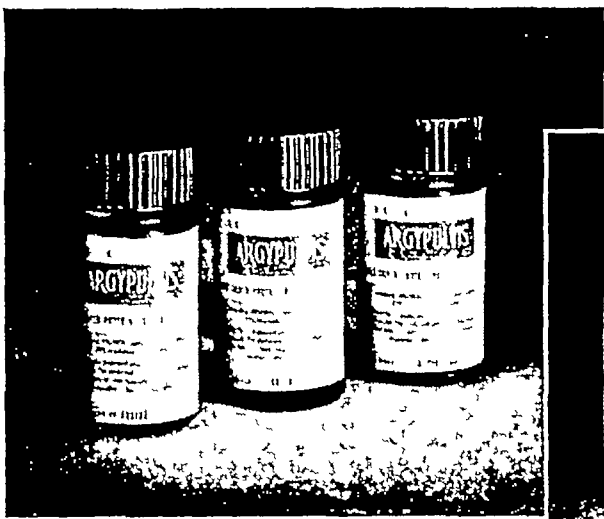
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7-gram bottles fitting Holmspray or equivalent powder-blower



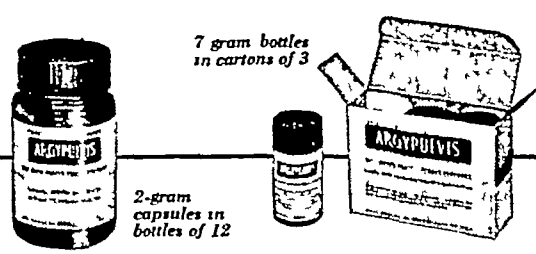
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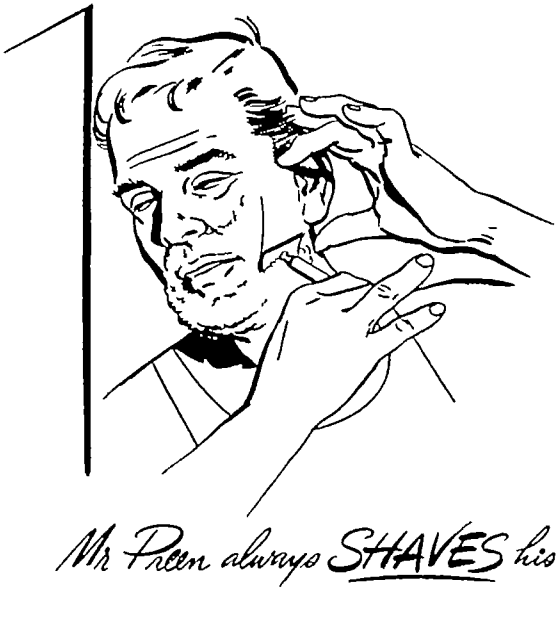
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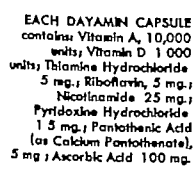
A C BARNES COMPANY
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Reich, Button and Nechtow, "Treatment of Trichomonas Vaginalis Vaginitis," Surgery, Gynecology and Obstetrics, May 1947, pp 891 896



Mr Preen always SHAVES *his breakfast*

When will people like Preen discover that a thousand missed breakfasts can add up to one subclinical vitamin deficiency? You know that *chronic breakfast skipping eventually can evoke a half sick, half well* complaint just as easily as chronic hurrying chronic worrying or faddist dieting Since these cases are usually the result of months—perhaps years—of nutritional sidestepping they often need immediate vitamin supplementation in conjunction with dietary reform To offset the whims of the patient s appetite and the wide variances in food values many physicians continue vitamin supplementation for the duration of treatment Very often their choice is DAYAMIN Abbott s potent multivitamin capsules Each easy to-take capsule contains six essential vitamins as well as pyridoxine and pantothenic acid. One capsule daily as a supplement more as a therapeutic agent Your pharmacy has DAYAMIN in bottles of 30 100 and 250 capsules If your patients don t like capsules, prescribe golden DAYAMIN LIQUID with the citrus-like taste—in bottles of 90 cc. 8 fluidounces and 1 pint. ABBOTT LABORATORIES NORTH CHICAGO ILLINOIS.



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(ABBOTT'S MULTIPLE VITAMINS)

in conjugated form, certain enzyme-systems appear necessary to free that acid from its conjugation Other enzyme-systems block the action of folic acid by competing for certain essential molecules An example of the latter is drug food competition observed in the action of sulfa drugs Here, the drug competes with para-aminobenzoic acid, a vitamin essential for bacterial growth Blocking of the para-aminobenzoic acid molecule prevents synthesis of folic acid by the organism This process of action and counteraction is repeated thousands, perhaps millions of times in the body, depending on the supply or intake of many identified, and probably still more unidentified nutrients It becomes clear, therefore, why biochemistry is so clearly related to nutrition

If we translate the active principles of the various foods of the diet into quantitative requirements for oxidation and reduction processes, then various foods containing these active principles take on new meaning for the physician He can search more effectively for the nutritional component of illness among his patients

The purpose of this page will be to help physicians broaden their knowledge and stimulate their interest in nutrition Its policy will be to discuss thoroughly known facts about nutrition as well as beliefs and practices now prevalent which are not based on facts

MEDICAL SOCIETY OF THE STATE OF NEW YORK

1948 District Branch Meetings

Date	*Branch*	*Place of Meeting*	*Time*
October 6	Sixth	Binghamton	Afternoon and evening (dinner)
October 20	Second	Garden City Hotel, Garden City	Morning and afternoon (luncheon)
October 26	First	Newburgh	Afternoon and evening (dinner)



Mr Preen always SHAVES *his breakfast*

When will people like Preen discover that a thousand missed breakfasts can add up to one subclinical vitamin deficiency? You know that chronic breakfast skipping eventually can evoke a half sick half well complaint just as easily as chronic hurrying chronic worrying or faddist dieting Since these cases are usually the result of months—perhaps years—of nutritional sidestepping they often need immediate vitamin supplementation in conjunction with dietary reform To offset the whims of the patient s appetite and the wide variances in food values many physicians continue vitamin supplementation for the duration of treatment. Very often their choice is DAYAMIN Abbott s potent multivitamin capsules Each easy to-take capsule contains six essential vitamins as well as pyridoxine and pantothenic acid One capsule daily as a supplement, more as a therapeutic agent. Your pharmacy has DAYAMIN in bottles of 30 100 and 250 capsules If your patients don t like capsules prescribe golden DAYAMIN LIQUID with the citrus like taste—in bottles of 90 cc. 8 fluidounces and 1 pint. ABBOTT LABORATORIES, NORTH CHICAGO ILLINOIS.



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And all Zymadrops* are created equal in that each bottle uniformly and dependably provides *all these essential vitamins* in potent, concentrated drop-dosage form The Upjohn manufacturing process *blends and disperses* both fat-soluble and water-soluble vitamins in Zymadrops for optimal stability, palatability and absorbability

*Trademark Reg U S Pat Off

Zymadrops

Each 0 6 cc contains

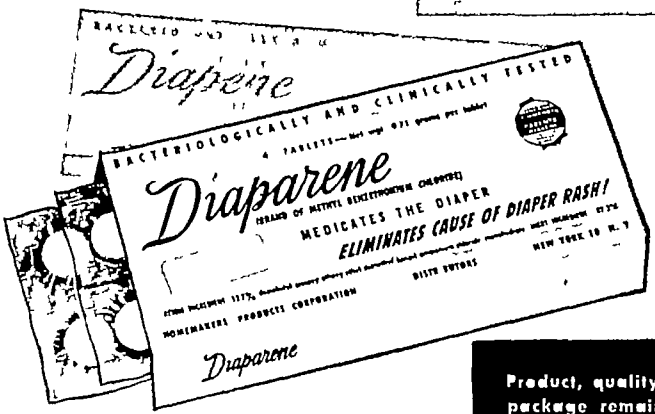
Vitamin A	5 000 U S P units
Vitamin D₃	1 000 U S P units
Thiamine Hydrochloride (B_1)	1 0 mg
Riboflavin (B_2, G)	1 0 mg
Pyridoxine Hydrochloride (B_6)	0.5 mg
Calcium Pantothenate	3 0 mg
Nicotinamide	10 0 mg
Ascorbic Acid (C)	60 0 mg
Alcohol	2%

Upjohn
KALAMAZOO 99, MICHIGAN

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REFERENCES:

1 Cooke J V: Brennemann Practice of Ped 4: Chapter 41 1945
2. Benson R. A. et al: J Ped 31 369 754 1947
3 Sullivan N: Int l Congress of Ped Mt Sinai Hospital New York, 1947

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City.....Zone.....State.....

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retains all of the "stand-out" qualities that have made Aminoids a protein supplement of choice.

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SUPPLIED: In bottles containing 6 oz.

PLEASE NOTE: Your patients may receive bottles labeled Aminoids until druggists' present stocks are exhausted.

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Salicylanilid	5%
Carbowax	95%

Ringworm of the Scalp

(Microsp Audouini or Microsp Lanosum)

Salinidol—Greaseless, Stainless, Odorless Easily removed with water

The hair must be clipped every 10 days and **Salinidol** applied daily

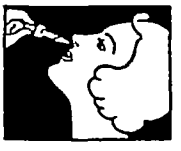
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For Head Colds, Crusts, Dryness of the Nose and Other Nasal Conditions



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(De Leoton Nasal Oil)

OLIODIN produces a mild hyperemia with an exudate of serum, loosening crusts relieving dryness and is soothing to the nose and throat. Breathing is improved

Try OLIODIN in connection with forms of treatment you may be using in the nose, such as tamponage sprays, etc. and note the improvement.



For The Eyes

OPHTHALMIC Solution No. 2

½ fl oz—2 fl oz

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Sol Oxycyanide of Mercury with Zinc Sulphate, Zinc Phenol sulphonate and Boric Acid in Distilled Water

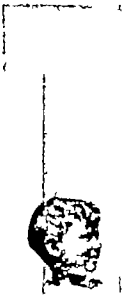
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1. In Diplo-bacillus infections.
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4. As a collyrium (Eye Wash)
5. To relieve irritation caused by wind, dust, bright lights etc.

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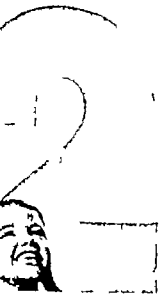
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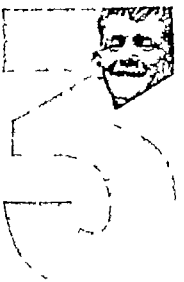
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1 Haven Emerson Journal Lancet 57 1 1947 2 Registered trademark, Sharp & Dohme 3 M Clin North America 27 567 March 1943

MULSAVITE

FACTS ABOUT NUTRITION

Prepared by the School of Nutrition, Cornell University, Ithaca
Norman S Moore, M D , Editor

In this issue the editorial board of the JOURNAL and the faculty of the School of Nutrition at Cornell University inaugurate a page entitled "Facts About Nutrition" Because the series of articles on this subject appearing in the JOURNAL in 1945 were received with interest, the editorial board believes that physicians will welcome a discussion of the newer concepts of nutrition The writers hope that this page will help to clarify much of the confused thinking on the subject and that it will arm physicians with a weapon for their day-to-day attack on disease and the prevention of disease

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While the subject of nutrition, defined in general terms, requires a knowledge of caloric needs and essential nutrients such as vitamins, minerals, and protein, a more specific interpretation of the meaning of nutrition is required by the physician He must remember that nutrients are not usable to the body until they are in the blood stream Many conditions interfere with the absorption of nutrients from the intestinal tract. It is not infrequent for patients with a plethora of nutrients in their diets to become seriously deficient in essential amino acids, vitamins, or fatty acids because of inability to absorb these essentials into the blood stream In sprue there is defective absorption of fat which can lead to deficiency of essential fatty acids. Absorption of vitamin K is changed in gallbladder and liver disease, occasionally so insidiously that hemorrhage occurs before the physician is aware that prothrombin is depleted. In many of the severe dysenteries, in addition to water and electrolyte losses, essential nutrients are not absorbed. In surgery there are numerous examples of essential nutrients in the blood stream reaching low levels. The improvement in healing when protein intake is adequate has encouraged surgeons to prepare more patients for operation with whole blood and plasma. Likewise there is increased use of casein hydrolysates and vitamins postoperatively

The physician must know why essential nutrients and their utilization within the body are biologically necessary For example, in the combustion of glucose there are many requirements in addition to insulin The glucose molecule, by combining with phosphates, obtains free and fast movement from blood to tissue and back again This phenomenon is called phosphorylation The chemical changes in the combustion of glucose depend on enzyme and co-enzyme systems, which in turn require magnesium, thiamine, niacin, and riboflavin to function Thus it becomes clear why, in certain diseases, notably beriberi and pellagra, gross disturbances in carbohydrate metabolism are found. Many physicians are unaware that the diabetic patient likewise requires enzyme-system essentials as well as insulin before control of the disease is complete

In anemia, iron, amino acids, trace minerals, and folic acid may be involved It has been learned that there is a relationship between clinical classification and etiology Microcytic anemia is usually associated in our thinking with iron deficiency, while macrocytic anemia most frequently implies a defect in red cell production Nutritional anemia most often is associated with deficient protein intake. Studies of the effects of folic acid on macrocytic anemia have emphasized the phenomenon of biologic competition While most foods contain folic acid

in conjugated form, certain enzyme-systems appear necessary to free that acid from its conjugation Other enzyme-systems block the action of folic acid by competing for certain essential molecules An example of the latter is drug food competition observed in the action of sulfa drugs Here, the drug competes with para-aminobenzoic acid, a vitamin essential for bacterial growth Blocking of the para-aminobenzoic acid molecule prevents synthesis of folic acid by the organism This process of action and counteraction is repeated thousands, perhaps millions of times in the body, depending on the supply or intake of many identified, and probably still more unidentified nutrients It becomes clear, therefore, why biochemistry is so clearly related to nutrition

If we translate the active principles of the various foods of the diet into quantitative requirements for oxidation and reduction processes, then various foods containing these active principles take on new meaning for the physician He can search more effectively for the nutritional component of illness among his patients

The purpose of this page will be to help physicians broaden their knowledge and stimulate their interest in nutrition Its policy will be to discuss thoroughly known facts about nutrition as well as beliefs and practices now prevalent which are not based on facts

MEDICAL SOCIETY OF THE STATE OF NEW YORK

1948 District Branch Meetings

Date	*Branch*	*Place of Meeting*	*Time*
October 6	Sixth	Binghamton	Afternoon and evening (dinner)
October 20	Second	Garden City Hotel, Garden City	Morning and afternoon (luncheon)
October 26	First	Newburgh	Afternoon and evening (dinner)

Scientific Articles

TROPICAL DISEASES OF THE GASTROINTESTINAL TRACT IN VETERANS

HOWARD B SHOOKHOFF, M.D New York City

(From the Tropical Disease Diagnostic Service, Bureau of Laboratories, Health Department, City of New York)

DURING the period of the second World War, there was endless discussion of the tropical diseases which returning service personnel might bring back home Numerous articles were published, all of a speculative nature The idea was current that we might expect widespread plagues of unfamiliar types at the end of the war Since this threat did not materialize, there was a rapid decline of interest in the tropical disease problem.

There have been few, if any, attempts to discover what actually has happened among our veterans with overseas service, with respect to tropical diseases. During the years 1945 1946, and 1947, approximately 2,000 veterans have sought the assistance of the Tropical Disease Diagnostic Service of the New York City Health Department. The resultant experience has given us some idea of the extent and character of the tropical disease problems among veterans.

As might have been expected, only a limited variety of diseases has been seen. The relative incidence of the various conditions is best observed in a group of 1 324 veterans examined during the sixteen months following V-J Day that is, ending December 31, 1946 Of these 1 324 four hundred sixty four or 33 per cent, had some form of so-called tropical disease The conditions found and the number of cases of each are shown in Table 1

TABLE 1 —TROPICAL DISEASES AMONG 1,324 VETERANS*

Disease	Number of Cases
Malaria	200
Amebia is	74
Intestinal helminths	67
Fil riasis	41
Dermatoels, probably i yeotis	38
Sp rue	22
Giardiasis	21
Schistosomiasis	3
Tropical eosinophilia	1

* The total number of cases in this table exceeds the number mentioned in the text, i.e. 464, because of the fact that in some instances a veteran had more than one disease

Presented at the 142nd Annual Meeting of the Medical Society of the State of New York, New York City Section on Gastroenterology and Proctology May 19 1948.

A considerable portion of these cases represents problems belonging to the field of gastroenterology

Amebiasis

Amebiasis is the most important of the tropical diseases seen in veterans because of the fact that its incidence has been fairly high, that in many cases it has been difficult to diagnose, and that it may exist in asymptomatic or subclinical form for long periods of time Among a group of 260 veterans, previously resident in New York City, in whom stool examinations were done as a routine without any specific indication from the standpoint of symptoms, 27 were found infected with *Endameba histolytica*. This suggests that, after elimination of the many cases of amebiasis already detected and treated during the period of active service, more than 10 per cent of veterans with overseas service still have amebiasis The prewar incidence in New York City did not exceed 5 per cent and was probably considerably less In New York State, with about a million and a half of veterans, there must be at least 70 000 cases of amebiasis in ex-service personnel Some have been detected and treated, but the majority remain to be found

These infections are of importance not only to the veterans but also to the population in general. The disease can and does spread here It has been possible to examine contacts of only a few of the veterans found to have amebiasis. To date we have found eight instances in which the same infection has been picked up in household contacts in five of these it was the wife of the veteran who was the victim.

It is not generally appreciated that amebiasis is not essentially a diarrheal disease. Although diarrhea is a frequent symptom, it may be entirely absent in some cases. Abdominal pain is common and is often present without diarrhea. Not infrequently, constitutional symptoms such as fatigue and fever are noted, and they may

TABLE 2 —Summary of Symptoms in 82 Cases of Amebiasis

Symptoms	Number of Cases
Gastrointestinal	
Diarrhea with abdominal pain	28
Diarrhea without abdominal pain	20
Abdominal pain without diarrhea	11
Abdominal discomfort (no pain)	4
Blood in stools	13
Nausea	7
Vomiting	4
Constitutional	
Fever	13
Chilliness or chills	6
Fatigue	12
Weight loss	11

either dominate the picture or occur in the complete absence of any gastrointestinal complaints

I have analyzed a series of 112 consecutive cases of amebiasis in veterans seen during 1945, 1946, and 1947 In two instances, no history was obtained In 28 cases there were no symptoms Table 2 is a summary of the symptoms present in the remaining 82 cases

Thus, diarrhea was absent in almost half the cases A history of blood in the stools was obtained in only 16 per cent of the cases In 20 cases, or 24 per cent, there were no gastrointestinal symptoms at all

Actually, there is a tremendous variation in the clinical manifestations of amebiasis I have analyzed the last 30 cases in veterans with respect to the presenting symptom In 11 instances it had no relation to the gastrointestinal tract Two of these 11 cases came because of filariasis A history of abdominal pain was later elicited in both The remaining nine cases complained of fatigue, weight loss, backache, chills and fever, or a combination of such symptoms

Case 1 —The most unusual among this group of cases with constitutional symptoms only was that of a physician veteran, 32 years of age He had had three attacks of chills and fever within a month Examinations of the urine had shown pus, and cultures were reported positive for hemolytic Bacillus coli He had been given sulfonamides and streptomycin without result He had a history of amebiasis while in military service He had received what appeared to have been adequate therapy and no longer had any gastrointestinal symptoms Examination of the stools, however, showed Endameba histolytica trophozoites Following specific therapy with diodoquin and sulfasuxidine, he stopped having fever, his urine no longer showed pus, and urine cultures became negative He appeared to have had pyelitis complicating an otherwise asymptomatic amebic infection

Among the 110 cases analyzed, there were six with hepatic involvement One had a definite liver abscess, one had acute hepatitis, and the remaining four had low-grade hepatitis This gives an incidence of hepatic involvement of 5 per cent

Case 2 —The case of acute hepatitis was instructive It occurred in a veteran of the China-Burma theater, 30 years of age The diagnosis was suspected only during his third attack of chills and fever He had had two previous attacks which were called pneumonia During his third attack he was noted to have tenderness over his liver and signs of consolidation at the right lung base X-ray studies showed elevation of the right diaphragm but no pneumonia The attack subsided spontaneously, and cysts of Endameba histolytica were subsequently demonstrated in his stools. Despite a course of emetine and diodoquin, he had a fourth attack This was promptly cut short by the administration of emetine

It is important to recognize that amebic involvement of the liver is not necessarily progressive and does not always lead to abscess formation if untreated There may be recurrent attacks as in case 2 or a low-grade subacute or chronic form of hepatitis

The diagnosis of amebiasis is, of course, primarily a laboratory procedure Nevertheless, it is the clinician who orders the tests, and if he relies on the examination of casual stools only, he will frequently fail to receive a positive report from the laboratory no matter how well-trained the technician may be and no matter what concentration methods he may employ The examination of warm, purged stools is essential In the group of 112 veterans under discussion, casual specimens were submitted in 100 cases A positive result was obtained in only 37 of these, that is, 37 per cent Of 106 in which warm, purged stools were examined, a positive result was obtained in 96 cases, or 91 per cent Without purged stools a majority of the cases would have been missed

Intestinal Helminths

If we exclude schistosomiasis, which is a vascular rather than an intestinal infection, helminthic diseases of the gastrointestinal tract have been neither frequent nor important among veterans This is shown in Table 3

TABLE 3 —Incidence of Intestinal Helminths Among 1 550 Veterans

Parasite	Number of Cases
Hookworm	36
Ascaris lumbricoides	21
Trichuris trichiura	20
Strongyloides stercoralis	5
Taenia saginata	1

The reason for the low incidence of intestinal helminths is probably the fact that these infections were easily detected by simple routine methods, and, consequently, most of them were treated before discharge of the infected individuals from the armed forces Furthermore,

hookworm, ascaris, and trichuris infections do not persist very long in the absence of reinfection Most of them disappear within two years although some hookworm and trichuris infections persist as long as five years

In no case was a trichuris infection the cause of symptoms The ascaris infections were, likewise, all asymptomatic except for the passing of worms in some instances.

In only one of the 30 hookworm cases was there anemia In 20 cases there were no symptoms The remaining 15 cases had symptoms which were probably due to associated conditions, such as amebiasis, in the majority There were four, however in which therapy definitely relieved symptoms Three of these had complained of diarrhea and the fourth of undue fatigue.

Strongyloides stercoralis infections were associated with diarrhea in two of the five cases In the others there were no symptoms. It is important, however, to bear in mind that these infections may perpetuate themselves through autoinfection and may cause symptoms years later The larvae are apt to be missed if fresh stools are not examined Purged stools are, therefore, an advantage in detecting these infections as well as for finding Endamoeba histolytica

Schistosomiasis

A large number of casualties during the Leyte invasion of 1944 were not due to enemy action but to the attack of the forktailed cercariae of Schistosoma japonicum Hundreds of our troops were infected In the majority of cases, these infections were detected and treated during the year following the invasion The fact that some were overlooked is attested by a series of recent articles describing cerebral schistosomiasis in veterans In addition to these missed cases, the infection undoubtedly persists among some of those who were treated since therapy is by no means always successful The cerebral cases are more likely to be detected, since they produce dramatic symptoms. More attention should be paid however, to the late hepatic manifestations. Within the next few years we are likely to see cases of cirrhosis among veterans with untreated or ineffectively treated S. japonicum infections.

The clinical picture of this phase of the disease is illustrated by the following case

Case 3—J M aged 26 was with the Army Engineers during the Leyte invasion late in 1944. In April 1945 he began to have attacks of epigastric and right upper quadrant pain sometimes radiating to the right scapula and to the top of the right shoulder and the neck. In December 1945 and again in May 1946 he had attacks of jaundice, ushered in with moderately severe epigastric pain. The first attack had been called hepatitis in an Army hospital. I first saw him, at the request of his physician during the second attack of jaundice. At that time he stated that he had been having intermittent diarrhea with blood and mucus in the stools since February 1946 He also stated that, while still in the Army he had been studied for an eosinophilia of more than 70 per cent.

On physical examination he was noted to have moderate jaundice of the skin and sclerae. He had no fever There was no enlargement of the liver or spleen.

The erythrocyte sedimentation rate was 38 mm. in one hour The blood smear showed 40 per cent eosinophils Examination of a warm stool specimen showed no parasites or helminth eggs The jaundice disappeared rapidly Three weeks later, the sedimentation rate had dropped to normal that is 10 mm in one hour, but the differential white blood cell count still showed 40 per cent eosinophils The clinical picture suggested intermittent obstruction of the common duct but gallbladder x-ray studies by the patient's own physician were reported negative for stones. The possibility of echinococcus cyst of the liver was considered The Casoni intradermal test was positive and the complement fixation reaction doubtfully positive.

It was decided to observe the patient for a while. He continued to have epigastric pain and distress intermittently When we learned that schistosomiasis could give a positive Casoni test, I suggested that the patient submit a series of stools for testing specifically for schistosoma eggs. He finally did this in January 1947 The first four specimens were negative The fifth and sixth after sedimentation showed eggs of Schistosoma japonicum.

He was given two series of fuadin injections, totaling 95 cc., by his own physician After this he was almost entirely relieved of his dyspeptic symptoms, but he complained of being unduly fatigued. He was last seen February 3 1948 Seventeen stools had been found negative for eggs. He still complained of fatiguability and also of epigastric tenderness. His white cells were 10 400 per cu mm with 20 per cent eosinophils Liver function studies showed a positive delayed van den Bergh reaction and a positive cephalin flocculation reaction It was felt that he still had active schistosomiasis and a course of tartar emetic was recommended because fuadin has a high rate of failure especially with S japonicum

There must be similar cases still to be diagnosed All veterans with vague dyspeptic symptoms and a history of exposure to S japonicum should have repeated stool studies for eggs. This is especially true if they have eosinophilia, but it is important to bear in mind that, by this time eosinophilia may no longer be present.

Giardiasis

There were 21 cases of infection with Giardia lamblia. This infection would ordinarily have been much more frequent in a group of individuals exposed to the tropics. Since a large number of

veterans took quinacrine (atabrine) regularly as a malaria suppressive and since that drug is also effective against G lamblia, many cases were prevented or cured A few of those infected, however, had been on quinacrine suppression Perhaps some strains of giardia can survive 0 1 Gm of quinacrine per day Of the 21 cases, seven had no gastrointestinal or other symptoms referable to the infection Of the other 14, ten had diarrhea, three had other gastrointestinal complaints, and one had unexplained weight loss Giardia lamblia is definitely pathogenic, and these infections should be treated

Sprue

Sprue is a much neglected and poorly understood tropical disease In its well-marked, relatively advanced stages, when there are soreness of the tongue, macrocytic anemia, x-ray signs of deficiency disease, and a grossly fatty diarrhea, it is easy to recognize Little attention has been paid, however, to the diagnosis of the condition in its early and mild forms It was not possible for us to carry out a complete clinical investigation of most of the cases we saw The diagnosis was usually based on the presence of a chronic diarrhea with flatulence, plus the finding of microscopic evidence of a steatorrhea, especially the presence of fatty acid crystals, and the absence of evidence of bacterial, protozoan, or helminthic infection

The following case is one in which it was possible to obtain the results of a sufficient number of laboratory tests to substantiate the diagnosis It demonstrates that classical sprue has occurred in veterans

Case 4—W L C , aged 29, married, entered the U S Army in March, 1944 He served in the Philippines from December, 1944, to September, 1945, and in Japan from September to December, 1945 He had a good appetite during that period but disliked the manner in which food was served so much that he failed to eat a good deal of his ration In September, 1945, after eight months in the Philippines, he began to have diarrhea which had been almost continuous up to the day on which he was first examined, April 18, 1946 He had as many as eight stools in a day They were light in color There were no cramps, but much flatus accompanied the bowel movements Since January, 1945, when he returned to civilian life, he had lost 25 pounds, although his appetite was good and he was eating home cooking For some time he had noted that his tongue was sore He felt tired and weak For two or three months his ankles had been swollen, especially toward the end of the day

On examination the patient appeared undernourished His skin was pale There was atrophy of the papillae at the tip and sides of the tongue



FIG 1 Abnormal pattern in the small intestine actually simulated adhesions between loops Findings returned to normal after sprue therapy



FIG 2 Barium enema showing tremendous dilatation of the colon

The heart and lungs showed no abnormalities, and examination of the abdomen was negative. There was no distention nor edema at the time he was examined

His blood showed hemoglobin 90 per cent red blood cells 3,050 000, white blood cells 6 400 normal differential count. Color index was 1 2 In the smear the red blood cells showed moderate variation in size with a considerable number of macrocytes

Examination of the stool which included both a casual and a fresh purged specimen showed no ova or parasites The naturally passed stool was very acid in reaction to litmus, unformed and pasty in consistency and light brownish-gray in color It had the appearance of rising dough X ray and fluoroscopic studies of the stomach and small intestine were reported as showing rapid emptying of the stomach and small intestine, dilated duodenum with thickened mucosal folds and a disturbed pattern in the remainder of the small intestine suggesting a deficiency state (Fig 1) A barium enema showed tremendous dilatation of the colon 8 000 cc of the barium mixture were said to have failed to fill the entire colon completely (Fig 2)

After the ingestion of 100 Gm of glucose the blood sugar curve was flat. The fasting value was 72 mg per 100 cc., at one hour it was 83 mg , at two hours 66 mg , and at three hours 74 mg Blood calcium was 11 mg per 100 cc.

The patient made a rapid recovery on a low fat high protein diet and injections of crude liver extract. Six months after the beginning of therapy x ray examinations of the small intestine and colon revealed no abnormalities.

Discussion and Summary

Certain tropical diseases have been seen and are still being seen with some frequency in veterans. Two which are yet to be seen are leprosy and echinococcus disease From the standpoint of the gastroenterologist, the most important diseases are amebiasis and schistosomiasis. Simple examination of casual stool specimens is not sufficient for the diagnosis of these conditions Special laboratory procedures, specifically, warm, purged stools for amebae and special concentration methods for schistosoma eggs, will usually be required.

POLIO CHECKED BY DRUG

The chemical conquest of virus diseases, which range from the common cold to encephalitis, or sleeping sickness as it is called, is heralded by the discovery of a chemical that stops infantile paralysis.

A number of polio victims are said to be walking around today, thanks to the chemical, called phenosulfazole with trade name of Darvisul, instead of being paralyzed and crippled for life. The drug has been given to more than 70 patients already this season and several hundred will probably get it within the next two months.

The chemical is a modified and very peculiar and interesting sulfa drug It was developed by Dr Murray Sanders of Columbia University, College of Physicians and Surgeons and eight chemists of Lederle Laboratories.

First trials of the drug started on patients in Texas this summer after extensive studies with mice and monkeys showed what it could do and that it was nontoxic and therefore safe to use Just how many cases have been aided by the drug in the Texas trials will need to be determined by exhaustive tests upon the patients who seem to have had beneficial effects from the drug

There is plenty of the drug. It is being supplied to physicians, provided they can give reasonable assurance that they can accurately study the patients. This is necessary with any new drug while proper dosages are being worked out. Dr Sanders feels now that some patients should be treated more vigorously than others But this type of knowledge could not be gained without the trials now under way

Besides the problem of dosage, there is another reason for being careful that the drug goes only to responsible persons. This is that otherwise many patients who did not have polio might get it, instead of getting some medicine they did need.

Dr Sanders and Lederle had hoped to have news of the drug reach physicians through regular scientific channels before it became public knowledge but this was prevented by premature reporting His work was not done under a grant from the National Foundation for Infantile Paralysis, and was not reported to the recent International Poliomyelitis Conference.

There does seem to be a good chance that, due to the public attention focused upon this new chemical agent, even prior to scientific publication, more doctors will join those now evaluating the drug clinically Formal statements about the results will continue to be withheld until later The drug is reported to be in ample supply and there is a polio epidemic. For these reasons more progress in testing the new treatment will be made in the coming weeks than otherwise would be the case.

Meanwhile with an infantile paralysis epidemic in Texas and North Carolina and possibly spreading elsewhere facts about this important advance have been obtained and reported by Science Service.

There have been some failures with the drug. If motor nerve cells have been destroyed the drug cannot be expected to restore them But it can stop the progress of the infection to more nerve cells and can prevent deaths from polio

The unique feature of the drug that it can stop a virus disease, gives hope that this or other drugs can be made to stop other virus diseases.

Full details about Darvisul were reported at a New York Academy of Sciences conference on August 23 —*Science News Letter July 31 1948*

PILONIDAL CYST

JOHN C M BRUST, M D ,* Syracuse, New York, and JOSEPH B SARNER, M D ,** Philadelphia, Pennsylvania

(From the Graduate School of Medicine, University of Pennsylvania, and the Department of Proctology, Mt Sinai Hospital, Philadelphia, Pennsylvania)

THERE is as yet no standardized method for the attempted cure of pilonidal cyst The confusion of thought is certainly not due to lack of expressed opinions The articles written on the subject during the years 1942 to 1948 nearly equal in number the total literature prior to the war years If the recent war served no other purpose, it certainly should have made the American physicians aware of the disease However, it is feared that the conflicting opinions regarding proper surgical therapy have caused and will cause only bewilderment as to the safest, most economical, and most certain method of cure

Wartime surgery had as its basic principle the fastest possible conversion of a man from a patient to a fighter It took some years for the medical corps of the Army and Navy to realize that the rapid return of a man to active duty entailed methods of trial and error that, in some instances, violated fundamental surgical principles The really vast literature on pilonidal cysts which appeared in a few short years was, in our opinion, largely worthless We say this because no really large series of cases has been reported which answered the following salient question What was the percentage of cures irrespective of the method employed? In fact, we are unable to find any sizable series of cases reported with an adequate follow-up since the paper by Rogers [1] Instead of methods of proved cure of the disease, the recent deluge of articles points up various schemes of primary closure with claims of success based solely upon immediate good results, failing completely to report absolute cure based on a follow-up of the cases after a minimum period of even six months With no attempt to caricature such reports, we can refer to an article written by a surgeon who reports 120 patients in an active Army hospital and, by special suture and prolonged preoperative "sterilization," concludes that he obtained absolute healing in 92 per cent of all cases A true skeptic, and we count ourselves in the group, will ask the following questions To render the wound even remotely fit for primary closure, how much time was lost from duty? How long after this elaborate block excision and detailed layer by layer closure was the patient confined to bed? If a certain proportion developed immediate or delayed wound infection, did not the subsequent secondary surgery greatly raise the average time spent in the hospital and increase the average period of total disability? And, of greatest importance, why does this author talk of 92 per cent "cures" in men who, after leaving the hospital with a presumably healed wound, return to an active military status and cannot possibly have been personally followed after an adequate lapse of time, which is not a matter of days or weeks but of months? The proponents of primary closure claim in stentorian tones that a wound closed and solid and clean at the end of three weeks constitutes a cure However, we have had the personal experience of doing secondary operations on well over 200 cases in which, following presumed primary healing, the wound had remained closed, clean, and essentially asymptomatic for periods varying from two weeks to as long as eight months, only to break open and discharge pus

It would seem logical then to claim no cure until at least twelve months had elapsed from the day the patient was dismissed with a solidly healed wound Any results we report today are based solely upon this premise We present nothing original as regards surgical technic We will merely outline a simple economical surgical plan which has been utilized in a total of 1,014 cases This program was evolved in 1937 by one of us (J B) with the following objectives in mind (1) to perform definitive surgery with a minimum period of preoperative delay entailing disability, (2) to perform an operation with the minimum sacrifice of tissue consistent with adequate postoperative care of a granulating wound, and (3) to follow such surgery by a regimen of care which precludes pocketing, bridging, and delayed healing

The method we are describing is merely an exteriorization of the cavity and a careful unroofing of any branching tracts or pockets To this extent it is nearly identical with the proved, successful method of curing a fistula-in-ano Thus, the tract is opened from its origin to its termination, including all ramifying branches, the base of the tract is gently scrubbed out with dry

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* Dr John C M Brust died on May 14

** By invitation

Presented at the 142nd Annual Meeting of the Medical Society of the State of New York, New York City Section on Gastroenterology and Proctology May 19 1948.

gauze until it is obvious and certain that no small or large side tracts or pockets have been over looked and not exteriorized The edges of the wound are beveled in a conservative fashion so as to facilitate ease of exposure and redressing postoperatively and to avoid premature roofing

Pilonidal cysts presenting primary, acute, or recurrent abscess would appear at first glance to be hopelessly beyond the scope of the above outlined procedure It was the observation in five acute cases seen in 1936 that prompted a change in our surgical attack on this disease. It had been standard policy where frank abscess was present to establish adequate drainage, and days or weeks later to do a very radical block excision of the entire cyst together with any side tracts Instead of this mere incision and drainage, how ever we attempted to unroof completely the cav ity and to excise rather gingerly the overhanging edges. The necrotic base was wiped out with gauze, and the entire cavity was tightly packed with dry gauze This gauze was soaked out in forty-eight to seventy two hours and the result ing wound was then treated by gentle daily pack ing, flushing out the cavity, daily sitz baths, and other means of simple hygiene. We observed that all the five cases so treated granulated from the bottom, that they were completely healed within four to ten weeks, and that eight to twelve months later there was no evidence of recur rence.

This method of "drainage by unroofing" has been consistently employed during the ensuing twelve years. Other authors have reported this simple one-stage plan [2-4] We hasten to add a minor chronologic modification If a patient is seen in the office or hospital with an acute abscess immediate conservative buttonhole incision and drainage by insertion of a small strip of rubber tissue is done to relieve severe pain and prevent extension while awaiting admission to the operat ing room or as happens these days, to a hospital bed Such preliminary drainage is not a routine surgical policy, it is a matter of humane ex pediency

Prior to the adoption of treatment of pilonidal cyst and sinuses by conservative exteriorization we had employed in common with the basic technic of men experienced in this field the method of radical block excision Such excision usually resulted in a very large, deep but admit tedly clean wound The pathologic department would frequently state however, that the actual cyst measured perhaps 3 by 2 by 2 cm. but that the specimen submitted en bloc measured 8 by 5 by 4 cm. This excess tissue was normal skin, fat, perhaps muscle, and probably fascia The time consumed in producing firm, smooth solid healing was certainly excessive and eco nomically disabling The principle was sound, however, and, as regards recurrence rate, ad mittedly far superior to any other [1 5] The dis ability and protracted postoperative care caused surgeons to seek short cuts. Thus the student of the subject began to read of primary closure, partial closure, delayed closure, plastic flaps, sliding grafts special suture material or suture patterns, and, in the past decade the employ ment of sulfonamide compounds locally, sys temically, or both, and lastly, penicillin The surgical creators of these "short-cutting" methods failed to tell us how many of their patients healed and remained free of recurrence after a lapse of at least twelve months

In 1937 Buie described his method of treat ment by marsupialization or exteriorization [6] In his description he stressed the histologic charac teristics of the cyst lining He portrayed how the base could be left intact and how, by suturing to the inverted skin edges, this base could be utilized as an adequate substitute for actual skin This method appealed to us, and we began to em ploy it We soon found, however, that there were frequently mechanical difficulties. The drawings illustrating the technic in Buie's original descrip tion portrayed a beautifully simple, shallow cyst in a relatively thin individual Unfortunately, we noticed the following characteristics in most of our patients (1) The cyst was often tortuous, and in many instances the basic lining had been partially or even totally destroyed by recent gross infection. (2) The patients themselves were more often than not heavy set, muscular persons with thick skin (3) The cystic-lined or necrotic tracts were frequently deep (4) In chronic cases upon opening the tracts we en countered large amounts of scar tissue These findings greatly curtailed the ease with which the beveled skin could be approximated to the edges of the base of the cystic tract or tracts. When tension was employed to effect such approxima tion we noted increased pain skin edema, and, at times, suture sloughing We subscribe to the fundamental principle of exteriorization but find that total or even partial marsupialization by suture can be employed in approximately 40 per cent of the total cases.

The method we employ will be described briefly and illustrated by drawings sketched by the artist in the operating rooms. The patient is admitted one day prior to operation. A light supper is permitted and the preparation neces sitates carefully shaving the hair from a skin area outlined by the surgeon in indelible pencil This extends slightly above widely lateral, and well below the suspected boundaries of the cystic

tracts The anus is not shaved unless, as often happens, a tract is known or suspected to approximate or even encircle the anal margins No breakfast is given the day of the operation, and a simple water enema is ordered

Moderate preoperative sedation is administered After an extensive trial of various anesthetics, including pentothal sodium, inhalation, and even a short and discouraging test of local block, we settled upon low spinal in minimal dosage as nearly ideal With this the patient is spared pain, the field is not distorted, and bleeding seems to be minimal, speed is not necessary and disturbing side-effects are infrequent Local infiltration anesthesia is inadequate except in the very small, shallow, and relatively uninfected cases Inhalation or intravenous pentothal anesthesia with the patient in the inverted prone position is frowned upon by most anesthetists Respiratory difficulties are more common, and we have consistently observed that pentothal is accompanied by greatly increased bleeding from the open wound during the operation A low dosage spinal anesthetic is ideal except for the occasional postoperative "spinal headache" About ten minutes after the spinal anesthetic has been administered, the patient is moderately inverted in the prone position Adhesive strapping to the buttocks may be employed for purposes of exposure, if the surgeon lacks adequate assistance This adhesive tape should be removed when all the tracts have been opened their full length and depth The wound should not be saucerized or beveled with the straps in place since, to do so, results in removal of too much or, as more often happens, too little of the overhanging margins The following figures, with their accompanying legends, portray the steps employed in an average type of pilonidal cyst operation (Figs 1 to 7)

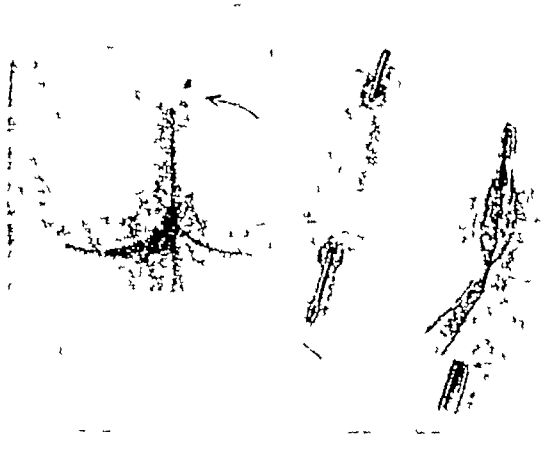


FIG 1 The tract is gently probed, and incision is made to unroof the tract. Infection does not prevent such unroofing

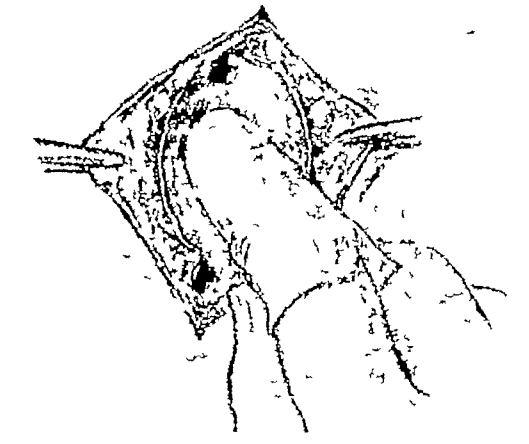


FIG 2 The open cystic tract and cavity is widely exposed, and the base is scrubbed clean with dry gauze Secondary sinuses, if present are quickly noted.

By leaving the base of the cyst intact, the need for hemostatic sutures is greatly diminished, thus producing a much cleaner wound in a much

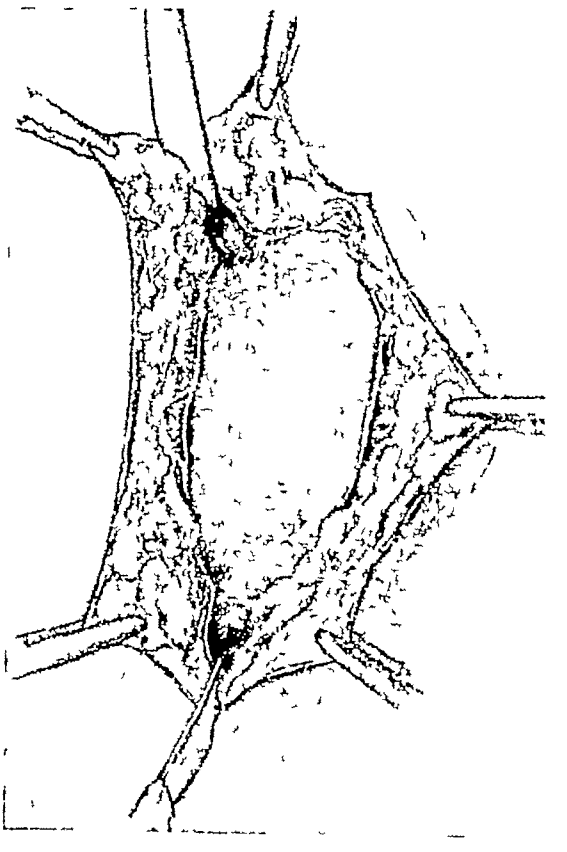


FIG 3 The secondary sinuses are probed, and further unroofing is performed



FIG 4. The tracts have been opened beyond their lateral and terminal boundaries. All traction is released, and conservative saucerization by beveling the skin edges is performed.

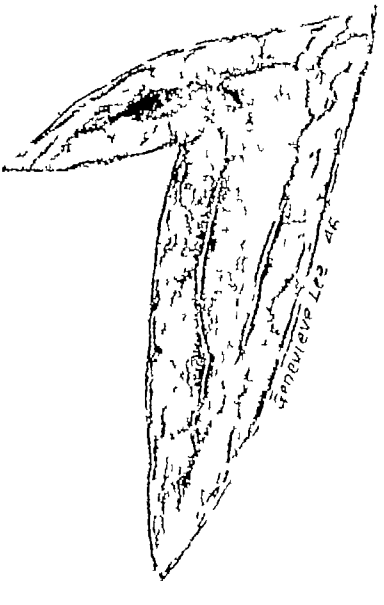


FIG 5 The completely opened and saucerized wound is carefully inspected. All bleeding vessels are ligated using #00 plain catgut.

shorter time. We agree completely with the thoughts expressed by Blaisdell in a recent article discussing the mechanics of healing in these wounds.[7] The beveling of the wound must be done on all sides, i.e., top and bottom as well as lateral walls. The deeper the wound or the more obese the patient, the greater the saucerization must be. We, too, believe it is failure to produce an easily exposed, easily dressed wound that is productive of not only delayed healing but residual sinus formation and the dreaded recurrence.

In almost all of the patients operated upon by us for so-called recurrent cysts, we noted the following features (1) The point of persistent sinus formation was found at the lowest angle of the scar (2) Of the operations we performed for recurrent cysts or infected sinus formation, 48 per cent followed attempts at primary closure 33 per cent followed partial closure with rubber drainage at one angle of the wound and only 19 per cent followed open operations with healing from the bottom up (3) Failure to obtain healing following open operation and packing of the wound resulted we felt, from inadequate postoperative care (4) Pathologic examination of the tissue from the base of these so-called recurrent cysts usually showed infected granulation tissue rather than a true epithelial-lined cyst wall

This would strongly indicate that such "recurrences" are mechanical, due to dead space faulty healing etc., rather than to the surgeon's having left cystic remnants. Upon completion of the operation, the wound is inspected in great detail Any suspicious area is probed, and where the slightest doubt exists, any pocket or sinus is opened and beveled. The use of dye or "chemical ferrets" in our hands was useless and not dependable. Such staining material seeps into normal tissue, obscures the field, and often fails to enter all the tracts due to blocking of such sinuses by scar formation

The wound is tightly packed with dry gauze held snugly in position by narrow adhesive straps The dressing is not disturbed for forty-eight to seventy two hours, and its removal may then be facilitated by soaking it to its depth with saline or a dilute peroxide mixture Upon removal of such a dressing a flat dry wound is usually observed Bleeding is minimal and blood clots at

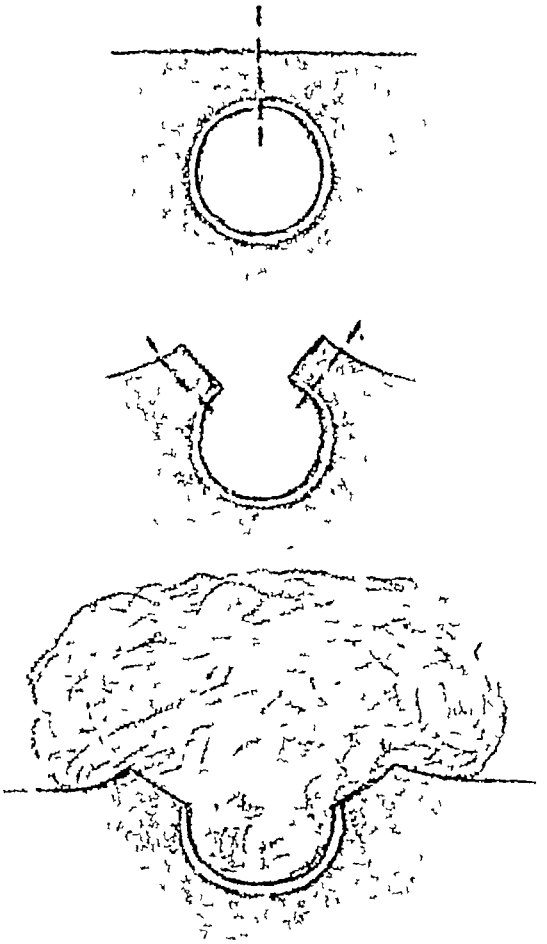


FIG 6 Schematic drawing of the basic principle and the method of packing



FIG 7 The appearance of the wound after approximately seven to ten days Such a patient should be fully ambulatory at this time and able to perform all but the most strenuous occupations or duties

the base are rarely noted Local medications, such as crystalline sulfonamides or penicillin are not employed If such a wound is properly created, infection is not a factor, and, with adequate aftercare, infection should never be a factor

The postoperative care of these surgical wounds is not complicated, but requires vigilance and constant inspection by the operator himself Before leaving the hospital, the patient, and, if possible, a member of his family is instructed as to the mechanics of healing and the need for cleanliness The wound is exposed, cleaned, and redressed as a demonstration The wound is kept flat, and every effort is exerted to prevent pocketing, transverse bridging, premature roofing, and overhanging edges The wound is dressed daily by the surgeon while the patient is in the hospital, and the patient or a member of his family is taught to dress it twice daily after returning home Hot tub baths or shower baths are encouraged beginning the day after the original packing is removed Many of the smaller shallow cysts appear so clean and dry that the patient may go home on the third or fourth postoperative day This is unwise, of course, in the larger, deeper wound In civilian life, however, it is very unusual to keep any patient in the hospital more than eight or nine days, even those patients with extensive wounds Similarly, many of the patients may resume work after as little as eight to ten days, and almost always within eighteen to twenty-one days The wounds will probably be open at this time, but if the surgery has been properly executed and the immediate postoperative care has been adequate, such wounds should be nearly flat, clean, and surprisingly painless If the patient's occupation involves riding a tractor or entails strenuous bending, squatting, etc , he must be warned prior to surgery that his disability may, for obvious reasons, be prolonged The patients return to our office every two to four days for the first three postoperative weeks and after that as seems indicated At these office dressings, the wound is carefully inspected,

trabeculations are gently broken down and exuberant granulations are destroyed Most important is the prevention of premature approximation of skin margins We have been greatly impressed with the need for keeping the outgrowing hair, which is often luxuriant, shaved back from the skin edges. This is particularly prone to be troublesome where the open wound extends well down into the intergluteal cleft. These hairs should be shaved away from the edges of the wound for a distance of 1/2 inch and such shaving should be done every four or five days until the wound is closed and healthy Here again a member of the patient's family can be of great aid.

Selection of Cases

In presenting results or drawing conclusions in any surgical procedure the surgeon should, in theory never base his figures upon selected cases The entire series should form such a basis. However, we feel that in fairness to the method described above and in the interest of accuracy, many patients' records must be discarded as statistically worthless. The reasons for this selectivity are obvious.

Military personnel, upon leaving the hospital, return to full duty in nearly all instances. Such patients may be taught how to care for the wound, but how well that is done is problematic During a period of forty-two months, we operated upon 640 men and women in the U.S Navy and Marine Corps The surgical approach varied in no way from that described above There was an average hospital stay in this group of eighteen and three-tenths days Nine of these patients required wound revision of a minor nature prior to their discharge from the hospital As regards the rate of cure, we will eliminate the entire group for one reason No follow-up was possible

A strenuous endeavor was made to follow all private civilian cases by personal inspection after a period of at least one year following dismissal from our care The total private cases numbered 220 and data are available on 211 of these persons. The rest could not be reached either in person or by questionnaire.

One hundred fifty four Veterans Administration patients were operated upon by us during the period from 1942 up to and including March, 1947 By personal inspection or by replies to a mailed questionnaire, accurate information is available in 91 instances. The remaining patients could not be reached or failed to answer or, in a rather discouraging number, the answers were clouded by irrelevant diatribes against the government, the armed forces, and the pension claims department of the Veterans Administration. To Dr V M Diodati Veterans Administration Liaison Officer to the U.S Naval Hospital Philadelphia, credit is due for his herculean efforts in locating these veterans and securing the follow-up data, such as they are

Data Based Upon Follow up Cases

There remain, therefore, 302 patients upon whom we base the following information

1 The average hospital stay was six and three-tenths days, with a minimum stay of three days and a maximum one of thirty-seven days

2 All but 20 patients were allowed out of bed twenty-four hours postoperatively and all but two were ambulatory in seventy two hours These two cases were very extreme wounds where we frankly admit adequate hemostasis was not obtained These were errors which should in no way reflect upon the method They reflect, instead, upon our surgical ability

3 In five patients, wound revision in the operating room was required either during the hospital stay or during the period of healing Again, we admit to errors in technic at the time of the original operation or to errors of omission during the postoperative period of healing We have arbitrarily named sixty days as the period during which such re-operation constituted a complication of convalescence rather than true recurrence or persistent failure to heal.

4 The period of time lost from work averaged thirteen and seven-tenths days with extremes ranging from five to fifty-one days.

5 The time required to produce a closed, dry wound averaged twenty-nine days in the group A few healed in as little as ten days Some persisted as rather indolent wounds for as long as sixty or more days Those failing to heal by sixty days, we count as surgical failures.

6 Failure to heal within sixty days or subsequent breakdown of the wound with sinus formation was noted or recorded in 16 instances. Using twelve months as the minimum period, no recurrence after such a lapse of time has been noted. Thus, the 16 failures result in a presumptive and probable curability rate of 94.7 per cent. This figure constitutes the outstanding reason for this presentation.

7 There were no deaths in this total series of 1 014 cases.

Conclusions

A simple safe surgical procedure which has been employed in a large series of pilonidal cysts is described The method of caring for the resulting wound is discussed, and the hazards of neglect are emphasized Statistical data concerning need for strict bed confinement, length of hospital stay loss of time from work, and the period required to establish complete healing are

reported, based on a careful review and follow-up of 302 operative patients after a period of at least twelve months A curability rate based on this same follow-up is computed to be 94 7 per cent

Discussion

F F McGauley, M D , *Schenectady* —The legal profession has a phrase known as "a nuisance case " In medicine, I believe, we have a similar situation in the treatment of pilonidal cysts During the past six years, this question has aroused so much interest that more papers have been written on this subject than the much discussed vagotomy, which is number two on the medical hit parade

Doctor Sarner and the late Doctor Brust are to be congratulated on their report of over one thousand cases Any man who reports one thousand cases on any subject speaks with authority

It is with satisfaction one finds such a low percentage of recurrences in pilonidal cysts The operation itself is very simple and almost foolproof, but I feel that 50 per cent of their success was due to their excellent pre- and postoperative care

After seeing so many postoperative cysts in my office, it occurred to me that I might analyze 50 of my own cases I thought it might require my work for a year or two, but, unfortunately, it was necessary to review the work for eight years, in order to dig out the 50 cases

In reviewing the relatively clean cases which were done by block dissection, it was found that the results were very satisfactory In the infected cases, we had a high percentage of recurrences, no matter what technic was used In infected cases, we tried both methods, one by block dissection, the other by incision and drainage with secondary closure One case recurred after three years The percentage of recurrence in any surgical procedure is a variable which depends on many factors

References

1 Rogers, H New England J Med 222 79 (Jan. 18) 1940
2 Jacobs R G U S Nav M Bull 41 1206 (Sept.) 1943
3 Adams J F *ibid* 48 250 (Mar.-Apr.) 1948
4 Marks M M South M J 40 844 (Oct.) 1947
5 Kleckner, M Trans Am Proct. Soc 37 166 (1936)
6 Buie L A. Practical Proctology Philadelphia W B Saunders & Co , 1937 p 480
7 Blaisdell P C J A.M A. 133 916 (Mar 29) 1947

SCIENTIST FINDS BODY ABSORBS ONLY MINIMUM OF VITAL VITAMIN B_1

Apparently, vitamin B_1, taken in husky doses in the fond hope that it will give extra pep and energy, is not the potent builder-upper that the millions of vitamin eaters believe it to be

It might be, only the body does not absorb enough of it, according to a Northwestern University scientist Laboratory discoveries by Dr Theodore E Friedemann indicate that oral doses of more than 5 mg daily are largely wasted (5 mg are roughly equivalent to $^1/_{61}$ the weight of the average aspirin tablet) Furthermore, in contrast to other vitamins, the continued administration of thiamin (vitamin B_1) occasionally leads to development of an allergic response

Dr Friedemann is research associate professor of physiology in the Northwestern University medical school Published results of his findings are included in the current issue of the journal, *Gastroenterology* His investigations were conducted in the department of physiology of the medical school and the laboratory of the Abbott Fund in Passavant Memorial Hospital, Chicago, and were aided by the Clara A Abbott Fund of the University Associated with Dr Friedemann in the research were Thaddeus C Mcieciak, Patricia Keegan, and Bernice Sheft

Dr Friedemann's findings indicate that, although thiamin plays a dominant role in metabolism, and is a normal and extremely necessary constituent of animal tissue, including man's, the body either has developed no special mechanism for absorption of the vitamin, or even may have developed barrier mechanisms for thiamin in the intestinal tract, which probably were evolved to prevent the entry of substances harmful, or not immediately useful, to the body

His tests led the scientist to believe that thiamin belongs to that group of substances which are relatively poorly absorbed in the gastrointestinal tract, the maximum economical level of intake being about 5 mg daily

In his experiments, Dr Friedemann's subjects were administered varying doses of supplementary vitamin B_1 in addition to carefully weighed and controlled diets Destruction and lack of absorption of the thiamin were measured by examination in the laboratory of their bodily excretions Data collected indicate that at least several hundred milligrams of the following vitamins, differing greatly in structure from thiamin, are readily absorbed riboflavin, niacin, pyridoxine, pantothenic acid, and vitamin C These substances, like thiamin, are normal and necessary constituents of all tissues

Summarizing his findings, Dr Friedemann states "Intestinal absorption of thiamin chloride hydrochloride by normal human subjects is extremely limited The maximum which could be taken orally without an increase of fecal thiamin was about 5 mg per day, or slightly less than 2 mg , including thiamin in food, at each meal

"At a total intake of 5 1 to 5 2 mg per day, the urinary excretion (of vitamin B_1) was greater when the vitamin supplement was given with meals than when given one hour before meals Thiamin mononitrate was absorbed, excreted, and destroyed at rates similar to those of thiamin chloride hydrochloride "

DIAGNOSIS AND TREATMENT OF COLON POLYPS

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(From the Memorial Hospital)

THE term polyp is applied to any pedunculated or sessile growth which protrudes into the lumen of the bowel and has the clinical appearance of a nonmalignant tumor Numerous types of polyps are found in the terminal intestinal tract. Each type has its origin in different tissues of the bowel Adenomas arise from the epithelium, lipomas from fat cells, fibromas from the submucosa or serosa, angiomas from the blood vessels, myomas from the muscularis or muscularis mucosae, lymphomas from the lymphoid tissue, and endometnoma from displaced endometrium, etc

Polyps may be found in any location within the large bowel They occur more frequently in the rectum and lower sigmoid and appear at any time from infancy to old age. The mucous or adenomatous variety is most common and will receive greatest consideration in this communication Adenomatous polyps are precancerous lesions which may undergo malignant change at any time. There are three clinical types of adenomatous polyps areas of hyperplasia, adenomas, and papillary adenomas

Areas of hyperplasia are small, sessile, slightly raised tumors which show only slight differentiation from the surrounding mucosa microscopically These areas are found frequently on the mucosa of the upper rectum and lower sigmoid in patients who present a toxic lower bowel and on areas of mucosa which have been exposed to irritation, such as the mucosa of a colostomy Areas of hyperplasia also are associated frequently with cancer of the colon and rectum.

The adenoma is the most common type of intestinal polyp It may be sessile or pedunculated The surface may be smooth or lobulated, ulcerated or covered with normal appearing mucosa Adenomas vary in size from a few millimeters to several centimeters in diameter They occur singly, in small groups and also in large numbers as a specific disease known as multiple polyposis in which the mucosa of the large bowel is studded with numerous adenomas

Papillary adenomas are much less frequently encountered than adenomas They occur chiefly in the old age group and are usually situated in the rectum and lower sigmoid We have not encountered a papillary adenoma proximal to the sigmoid colon Papillary adenomas are usually sessile but occasionally possess pedicles which are almost as large in diameter as the tumors themselves These tumors are soft and have a papillary or lobulated appearance

Adenomatous polyps are found in all sections of the terminal intestinal tract. A review of 307 cases revealed the following distribution the colon and rectum were involved in six cases, the colon in 133, and the rectum in 168 cases. The dividing line between the colon and the rectum is calculated to be 15 cm caudad to the anal skin margin

The frequency of occurrence is revealed by the findings at routine colon and rectal investigations of patients attending the Strang Cancer Prevention Clinic In a series of 2,012 cases, 188 patients, or 6 4 per cent, were found to have some type of nonmalignant polyp The incidence in men is higher than that found in women. In 894 women, 32, or 3.5 per cent, had polyps, while in 2,018 men, 156 had polyps an incidence of 7 7 per cent.

The histologic status as to benign atypical, and malignant qualities of adenomatous lesions varies widely We have yet to find any malignant tissue in the so-called areas of hyperplasia The papillary adenomas, which are limited chiefly to the rectum, will frequently show atypical and malignant change A review of 48 such cases, followed over a period of many years, revealed that 68 per cent of them had areas of malignant change, either at the time of the original treatment or during the subsequent years. Histologic examination of 96 adenomas revealed 64 to be nonmalignant, while 32 showed atypical or indefinite malignant change at the time the original biopsy was taken or at the time the polyp was removed The above figures as to malignant change in adenomatous polyps serve to emphasize the importance of recognition and treatment of all such polyps within the terminal intestinal tract.

Experience suggests that the present status of diagnosis of polyps of the colon is poor A fair percentage of patients with colon cancer present a history suggesting the presence of a polyp for years prior to the diagnosis of cancer Other patients with polyps that have not undergone malignant change present symptoms dating back for months or years prior to recognition. Improve-

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ment in the diagnosis of colon tumors and colon disease will take place when symptoms suggesting colon disease receive greater consideration by the laity and profession

Too frequently, minor symptoms of colon disease are completely overlooked by the family physician, and patients are forced to resort to the use of patent medicines for relief without any effort being made to find the real cause of the symptoms Symptoms produced by small polyps are indefinite Occasionally polyps without recognizable symptoms are found in a normal functioning bowel. However, in most instances, a careful history as to intestinal disorder will reveal degrees of abnormal function of the colon and rectum. Improper elimination and a change from normal bowel habit is common The amounts of abdominal gas and distress and rectal flatus are increased There may be attacks of diarrhea and constipation with the passage of dark or bright red blood from the rectum. One of the most important and common symptoms of colon polyps is bleeding from the rectum at irregular intervals Very often the bleeding is associated with an attack of diarrhea, the blood and diarrhea lasting for a day or two followed by an interval of freedom varying from weeks to months A history of irregular bleeding is always strongly suggestive of a polyp within the colon when careful proctoscopic examination fails to reveal sufficient anal and rectal disease to account for the blood Symptoms of pressure within the abdomen are not uncommon with large colon polyps A number of the larger variety also produce varying degrees of partial obstruction This obstruction is aggravated from time to time by degrees of intussusception Constant diarrhea or frequent stools with increased amounts of mucus, blood, and flatus, associated with varying degrees of anemia and loss of weight, frequently precede the diagnosis of multiple polyposis

Diagnosis is not difficult All polyps of the colon, with the exception of small areas of hyperplasia, may be demonstrated A careful physical examination may reveal a polypoid mass on palpation of the abdomen, while tumors of the sigmoid are occasionally detected in the cul-de-sac on vaginal examination The majority of sigmoid tumors may be diagnosed by sigmoidoscopic examination Tumors of the colon, proximal to the sigmoid, can be demonstrated by fluoroscopy, barium, and air contrast enemas

Proctosigmoidoscopic examination which constitutes the first step in investigation of colon polyps permits inspection of the anal canal, rectum, and lower sigmoid colon Sigmoidoscopes, measuring from 30 to 35 cm in length and of different diameters, are necessary The patient is placed in a position suitable for the passage of the instrument beyond the rectosigmoidal junction into the sigmoid colon Sigmoidoscopic examination not only permits direct vision of the polyp within the lower sigmoid but may afford valuable information as to any pathology situated at a higher location Blood and blood-stained mucus coming down from upper segments of the colon beyond reach of the end of the sigmoidoscope always suggest the presence of an ulcerating lesion higher up in the colon The exact nature of atypical polyps may be ascertained by taking a piece of tissue for histologic examination through the sigmoidoscope at the time of examination

Colon polyps above the apex of the sigmoid can best be recognized by roentgen-ray examination Such examinations are satisfactory only when the bowel is free of fecal material Two or more days of preparation are usually necessary for cleansing the sluggish colon Large polyps are easily recognized by the ordinary barium enema Small polyps can best be shown by means of air contrast technic The addition of tannic acid to the barium offers advantages in demonstrating these small polyps Pressure technic films over accessible parts of the colon and stereo plates occasionally add to the efficacy of this method Because of the possibility of error in interpreting the films of suspected small lesions, it is at times advisable to repeat the examination before making a definite diagnosis

Treatment or removal of colon polyps involves both minor and major surgical procedures Single, small, and medium-sized polyps with pedicles located in the lower section of the sigmoid may be successfully removed with an electric cautery snare Removal of polyps of the colon above the apex of the sigmoid necessitates a laparotomy The findings in each case govern the abdominal surgical procedure The latter may vary from colotomy to total colectomy

Cautery snare removal is suitable for most pedunculated polyps within reach of the sigmoidoscope The majority of adenomas lend themselves to this approach On the other hand, the papillary adenomas of the sigmoid colon are usually large, sessile tumors and seldom can be completely eradicated by this method Cautery snare removal through an electric-lighted speculum may be either an easy or difficult operation Removal of lesions above the reflection of the peritoneum is always associated with a moderate degree of danger Therefore, this operation should not be undertaken by those unfamiliar with snare removal technic and the hazards of this procedure Removal will be greatly facilitated by placing the patient in a position which renders the polyp most accessible for removal The selected position may be determined at the

time of the previous examination Caudal anesthesia permits a painless procedure and relieves the anxiety of the patient A bipolar machine with a coagulating current is quite satisfactory A type of snare which will permit taking a number of bites in rapid succession is necessary, as a number of adenomas must be removed by the piecemeal technic The size of the wire forming the snare is carefully selected for each case. The actual procedure of removal consists of bringing the polyp into direct vision at the end of the sigmoidoscope, placing the wire around the pedicle, connecting the current, and slowly cutting through the pedicle at the selected site A coagulating current of sufficient intensity, together with slow closure of the snare, will prevent bleeding.

All polyps situated above the reach of the sigmoidoscope, and a few of those located in the sigmoid require abdominal surgery for removal Preoperative preparation of patients for the removal of nonmalignant tumors is as important as preparation for resection of colon cancers In both instances, the lower bowel should be free of fecal material, and the general condition of the patient capable of withstanding radical colon surgery A period of five to seven days is usually sufficient for cleansing the colon and for adequate clinical and laboratory investigations. Longer periods may be required for cleansing toxic and sluggish colons and for the preparation of those patients who require an improvement in their general physical condition before operation The colon is cleansed over a five-day period by the administration of Epsom salts in doses sufficient to produce five to eight stools in twenty four hours, together with a daily colonic irrigation Preoperatively, patients receive liberal amounts of vitamins, intramuscular injections of liver, and other medication as seems advisable

The surgical procedures which are employed in a miscellaneous group of cases are colotomy resection of the right colon partial resection of the left colon and total colectomy The abdominal cavity is usually opened through a midline incision. Congenital adhesions and congenital deformities, which are not uncommon in these cases, may increase the difficulty of recognition and removal After a general exploration, the colon is carefully palpated, the polyp or polyps localized, and the extent of involvement determined Difficulty may be encountered in detecting the small soft, movable lesion. A good x-ray film available at this time facilitates the problem of detection. We have removed a single polyp from the sigmoid colon in two patients who had been previously explored with negative results

Colotomy is the procedure of choice in removing the majority of single polyps This operation is not difficult The polyp is located by the sense of touch The section of bowel containing the polyp is brought to a suitable position An intestinal clamp is applied to hold the colon in position and to avoid unnecessary soiling The field is carefully protected with abdominal pads. An incision 3 to 5 cm in length is made through the longitudinal band near the base of the pedicle Excessive amounts of mucus, when present, are removed by suction or sponging If necessary to bring the polyp into view, the edges of the bowel are retracted The polyp, when visualized, is picked up with a forceps and removed after tying the pedicle. The intestinal incision is closed with a double layer of sutures, and the colon is replaced to its normal position Two or more polyps situated in different sections may be removed in a similar manner at the same operation. Colotomy is well tolerated, provided there is no undue soiling Convalescence is short and comfortable, the bowels move on the fifth, sixth, or seventh postoperative day without aid of strong cathartics

Resection of the right colon is the method of choice for removal of very large single and multiple small polyps, located in the cecum, ascending, or proximal section of the transverse colon A large single lipoma of the cecum in one of our patients was removed in this fashion and on several occasions it has been necessary to do this resection for multiple smaller lesions The one-stage procedure with anastomosis of the terminal ileum to the transverse colon is usually employed The use of the Miller Abbott and similar tubes in the postoperative period has lessened the danger in a one-stage right colon resection Convalescence is short, and the patient usually leaves the hospital during the second postoperative week.

Large single polyps and localized areas of multiple adenomas when situated in the left colon, may require resection of a segment of the colon. Sessile, papillary adenomas, when located in the sigmoid are very suitable for segmental resection and end to-end anastomosis. Other types of single nonmalignant tumors, too large for colotomy, located at any site between the midtransverse colon and rectosigmoidal junction may be treated in a similar manner Large tumors associated with symptoms of obstruction and proximal bowel dilatation, are best removed by the Mikulicz type of operation. This multiple stage procedure is preferable also for eradicating ill-defined areas of multiple polyps. The double-barrelled colostomy permits careful inspection of both proximal and distal loops for remaining polyps and allows their removal before continuity of the bowel is restored

Multiple polyposis is a disease of childhood and

young adults Our experience with a limited number of cases suggests that there may be more than one type of this disease Experience has proved that all untreated patients with congenital adenomatosis will develop adenocarcinoma Therefore, the only treatment is colectomy Fortunately, the rectum may be retained in a group of patients when the polyps within the rectum can be removed or controlled by snare removal and fulguration Colectomy with removal of the rectum is necessary when the polyps of the rectum show atypical or malignant change Retention of the rectum is greatly preferred to an abdominal ileostomy, as the only handicap of the former is the increase in the number of stools Total colectomy with or without retention of the rectum in our cases has been carried out in two or three stages However, with present-day supportive measures in major surgery, it might be possible to reduce the hospital confinement by a one-stage procedure

All patients who have had polyps removed from the terminal intestinal tract should be kept under observation indefinitely The large bowel, once the site of a mucous polyp, seems to remain a fertile field for the development of more polyps and, occasionally, the return of one at the original site A check in the form of a careful history followed by sigmoidoscopy and roentgenographic investigations at regular intervals will usually afford early recognition of subsequent lesions

Summary

1 The majority of colon polyps are of epithelial origin They occur most frequently in the distal segments

2 The common clinical types of epithelial polyps are adenoma, papillary adenoma, and areas of hyperplasia

3 Passage of blood is the most common symptom Blood may be associated with attacks of diarrhea occurring at irregular intervals

4 Diagnosis is made by proctosigmoidoscopic and roentgenographic examinations

5 The majority of pedunculated polyps in the lower sigmoid may be removed by the electric cautery snare Inaccessible polyps of the sigmoid and those in the proximal sections of the colon are removed by abdominal surgery The operations include colotomy and partial and complete colectomy

Discussion

Chas Gordon Heyd, M D, *New York City*—The incidence of polyps of the colon and rectum is certainly higher than is usually supposed About 70 per cent are in the region of the rectum and rectosigmoid and are visualized by means of the proctoscope This is about the same distribution of malignant disease in that area Fully one third of the patients have multiple polyps, and there is a striking family incidence It has been assumed that 58 per cent of malignancies of the colon and rectum develop on or in polyps that have undergone degeneration Fitzgibbon and Rankin found 24 carcinomas in 13 patients, and I have found in my own personal experience four cases of two malignancies occurring in the colon where the presumptive evidence was that they were due to degeneration of polyps [1]

The symptoms of polyps are practically nonexistent until they become malignant Occasionally, a large polyp may produce pain and some symptoms of partial obstruction It is when the polyp becomes malignant that the symptoms ensue, and they are due to the change from a benign to a malignant condition The symptoms Dr Binkley has emphasized are alteration in bowel rhythm, presence of blood or mucus, intermittent passage of blood with long clear intervals, and, occasionally, abdominal pain The diagnosis is sometimes very difficult and requires persistent attention and interest upon the part of the consultant I am quite sure the routine proctoscopic examination of any series of consecutive cases would demonstrate a surprisingly large number of rectal polyps whose early removal, before malignancy had taken place, would effectively prevent the development of carcinoma of the rectum and rectosigmoid

[1] Fitzgibbon, G and Rankin F W Surg., Gynec. & Obst 52 1136 (1931)

A WORD TO THE WISE

The curious thing is that legislators—and for that matter people generally—seem to feel that tuberculosis is someone else's disease and is paid for by the victim and his family The idea is completely wrong Tuberculosis has to be paid for by society The only choice is how the bill will be paid—*Illinois Medical Journal, April, 1947*

A A MOVEMENT NOW INTERNATIONAL

Fifty per cent of inebriates who join Alcoholics Anonymous abandon drinking immediately, 25 per cent backslide once or twice, and 25 per cent are "improved," says A A Membership now totals 60,000 and is spread through the U S, England, South and Central America, and Australia—*Medical Economics, July, 1948*

RADICAL OPERATIONS ON THE HEAD OF THE PANCREAS

WILLIAM BARCLAY PARSONS, M D , New York City

(From the Department of Surgery, College of Physicians and Surgeons Columbia University and the Presbyterian Hospital)

DURING the past decade there has been a striking change in the magnitude of the operations being performed daily in all parts of the country This is due largely to the impact of the war years when, under pressure, there was a rapid advance in our knowledge of the various measures ancillary to more operative technic Fine-silk technic better anesthesia, the various chemotherapeutic agents, further understanding of the physiology governing the circulating body fluids and alterations in the chemical constituents thereof, and greater familiarity with the methods used to correct disturbances in the balance of the latter have led to the undertaking of operations undreamed of twenty five years ago

The confidence thus engendered in the feasibility of these procedures was well placed In creased practice in their performance has resulted in greater technical facility and hence lowering of morbidity and mortality Such operations as pneumonectomy esophagectomy, and splenorenal shunting those to overcome congenital cardiac defects, as well as radical operations on the head of the pancreas, are showing improvement in operative results similar to that previously experienced in goiter, gastric and colon surgery, all of which not so long ago were considered, and rightly so, as dangerous operations.

Cancer surgery however still labors under the handicap of an unknown factor, namely the extent of spread at the moment of operation Until we are in a position to know more about the why how, and where of cancer we are forced to subject individuals to a great risk for a possible greater gain

Cancer of the body of the pancreas can rarely be recognized at a time when it may be removed with any reasonable expectation of success Unfortunately, the same holds true with cancer in the head of the gland except when there is early involvement of the lower end of the common duct resulting in jaundice For the purposes of this discussion, because of similarity in diagnosis and treatment lesions of the papilla regardless of whether their origin be in duodenal mucosa or terminal common duct, will be grouped with lesions in the head of the pancreas arising so close to the common duct that jaundice is caused early in their development

The appearance of jaundice at an early stage in the development of the tumor is vital for successful treatment, because this may bring the individual to operation before the occurrence of lymphatic invasion or local extension through the capsule to the superior mesenteric vein or retroperitoneal tissue In the absence of jaundice pancreatic pain interference with the digestion of fat, or a palpable mass may lead to a diagnosis by exclusion However, the diagnosis in the vast majority of early cases will depend on determining what kind of jaundice is present.

Jaundice may be obstructive from a tumor or common duct stone, or nonobstructive due to hepatitis from infection, homologous serum virus, or cirrhosis. The differential diagnosis will be difficult in those cases where obstructive jaundice has been present long enough to result in liver damage or where there is concomitant cirrhosis In most cases, particularly if early in their course, the correct diagnosis should be obtained promptly if all measures are employed at once The direct and indirect van den Bergh tests may be helpful but cannot be relied on if not further supported by other evidence and, therefore, are seldom employed in our clinic We rely on history, the serum bilirubin level, the presence or absence of an enlarged gallbladder, cephalin flocculation, alkaline phosphatase, duodenal drainage, and occasionally, x-ray of the duodenum The fluid obtained by duodenal drainage is examined chemically for bile, microscopically for pigment granules cholesterol crystals, and red blood cells and by digestion If above a pH of 7 5 for pancreatic ferments

TABLE 1.—DIFFERENTIAL DIAGNOSIS OF JAUNDICE

	Hepatitis	Stone	Tumor
Alkaline phosphatase	−	+	+
Cephalin flocculation	+	−	−
Duodenal drainage			
Bile	+	−	−
Crystals	−	±	−
Ferments	+	+	+ (2 Ducts, 1 Duct)
Blood	−	−	+
Distended gallbladder	−	−	+ (80%)

Table 1 indicates the positive and negative findings obtainable in typical cases of the three important conditions associated with jaundice Pancreatic ferments will be found in the duo-

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denum when a duct of Santorini is present, even though the main duct of Wirsung is blocked, and blood will be present if there is ulceration as is common with lesions on the surface of the papilla Occasionally by x-ray one will find an enlargement or distortion of the duodenal loop, or, and this is extremely important when present, a filling defect in the midportion of the descending limb caused by an ulcerated lesion around the papilla of Vater

These patients exemplify those problems in nutrition, protein metabolism, electrolyte and fluid balance, as well as liver and renal function, that have been the object of research for many years, and have been the subject of numerous books and papers The coexistence of jaundice, hepatic and renal dysfunction, malnutrition, and anemia, all of which may occur in these patients, imposes a number of physiologic handicaps which must be overcome if surgery is to be successful Of special importance are the problems derived from disturbance of the distribution of water, protein, and electrolytes between the three main fluid compartments of the body

Renal function, cardiac efficiency, and the status of the constituents of the blood can be determined while other tests are in hand, as it is neither necessary nor wise to wait until the diagnosis has been made and operation decided upon before instituting a number of other diagnostic and therapeutic measures that may be indicated in any event Blood examination on admission should include a complete count, hematocrit, clotting time, and grouping Routine urinalysis plus phenolsulfonphthalein excretion rate must be supplemented by an electrocardiogram and blood chemistry studies The latter should determine the electrolyte balance of sodium, potassium, chloride, and carbon dioxide, and the circulating total proteins, including the albumin-globulin ratio, and nonprotein nitrogen A fair approximation of the patient's electrolyte balance can be obtained by calculation of total base from the simple determination of plasma chloride and CO_2 concentration However, we have recently found that valuable supplemental data are provided through the direct measurement of plasma sodium and potassium with the flame photometer

These studies will indicate deficiencies to be corrected promptly Vitamin K will be indicated for prothrombin deficiency, blood transfusions for anemia can be supplemented by one of the amino acid preparations for hypoproteinemia when a high protein intake by mouth is impracticable or requires reinforcement Salt and sugar administration will be governed by urinary output and specific gravity when checked against the sodium, CO_2, and chloride levels in the blood in order to prevent either dehydration or overhydration Frequent determinations of the blood volume would be desirable could this be accomplished without the use of Evans blue dye, isotopes, or plasma, all of which have definite disadvantages when administered repeatedly The blood volume, including plasma and cell volume, should be measured shortly prior to operation to establish a base line and to confirm any improvement in status suggested by the appearance of more normal findings in blood chemistry tests in the later stages of preoperative preparation

Many patients with jaundice will show relatively normal levels of the constituents of the circulating blood but will have a considerable shift in the makeup of their blood volume as shown by a relative increase in plasma volume and decrease in circulating red cell mass, although the total blood volume may be nearly normal This increase in plasma volume is almost certainly accompanied by an increase in the intracellular fluid, which is a point of prime importance in the postoperative period What amounts to malnutrition edema may occur if the circulating protein has been maintained at the expense of the cellular protein, and, if potassium in the cell has been replaced by sodium, the greater osmotic pressure of the latter brings more water with each molecule, thus increasing the intracellular fluid Overenthusiastic administration of sodium chloride further accentuates this tendency toward edema, which will be further emphasized in the presence of anemia We have been greatly encouraged in recent months by the response of some of our patients to the judicious use of potassium chloride when the level of plasma K is below 3 0 m eq /l

The technical operative problem consists in, first, the excision *en bloc* of the cancer area with those structures whose blood supply will be unavoidably impaired thereby, and second, the reconstruction of a continuous alimentary tract including anastomosis with the biliary system and a new portal of entry for pancreatic secretion The operative procedure has been fully described by many authors as well as the writer and will not be detailed here because of the time limitation [1]

The postoperative supportive measures are directed toward nutrition and the restoration of proper fluid, protein, and electrolyte levels A complete score of intake and output must be kept as a daily balance sheet to avoid dehydration or, far more commonly, overhydration The intake columns should show what is taken by mouth, the amounts and kinds of fluids by vein or under the skin, and the output columns should show all drainage by nasogastric tube or vomitus, any return by the sump drain, and the total urine excreted The sheet should also indicate the

daily intake of protein, sugar, and salt and the laboratory data concerning urine specific gravity hematocrit, and blood levels of electrolytes and protein.

During operation the patient will have received 2,000 cc. of blood, which will be slightly in excess of the amount of blood lost, and perhaps 500 cc of glucose in saline Another 1,000 cc of blood or glucose in water may be given that night

Beginning with the next morning the total intake of fluids should be strictly limited to 2,500 to 3,000 cc., depending on the size of the individual The only exceptions would arise in patients who showed considerable losses of fluid from nasogastric suction or a fistula. Protein can be given by the use of one of the amino acid preparations or whole blood and sugar in saline or watery solution Great care must be exhibited in the amount of saline administered Frequent testing of the urine for specific gravity and of the blood for levels of sodium, chlorides, and CO_2 checked by blood volume study during the week, will determine the body needs in amounts and kinds of fluids. Small amounts of water may be allowed by mouth after one day Usually, the nasogastric tube can be removed by the third day, at which time most patients will accept the better part of a liter a day by mouth.

Just as soon as fluids are taken by mouth, those given parenterally should be reduced. It was of interest to review some histories of patients operated on during the war when, with shortened staff and pressure of work, the overadministration of fluids was almost automatically avoided Some of these patients received as low as 1,500 cc of fluid and made good recoveries After the war the enthusiasm for administering fluids returned Between the seventh and twelfth days after operation, we lost three patients with wet lungs, gastric dilatation, and a little fluid in the abdomen, these patients had received up to 4,000 cc daily of blood, aminoacids and other solutions, particularly saline, in an attempt to stabilize the hematocrit and serum protein levels This experience emphasized the danger of overhydration and the lack of definite information from the hematocrit and serum protein determinations alone In a recent case of a patient who was losing potassium in her drainage fluid and showing dependent edema in spite of limited intake and excellent output, the parenteral administration of potassium in Darrow's solution was followed by marked diuresis rapid subsidence of drainage, and a markedly increased activity of wound repair

It is in the analysis of follow up results that one enters a field of philosophic discussion where there are only a few facts One patient is alive, but with a nodular liver in her eighth year after operation One patient succumbed to another operation over three years after his pancreatectomy, and no evidence of tumor was found at autopsy It is hoped that some of our surviving patients now under the five-year period will continue to do well, as many of their specimens suggest adequate tissue removal Since the formation of a team eighteen months ago to oversee the preoperative preparation, to perform the operation, and to follow the postoperative course, we have done six of these operations with no deaths although the mortality rate in my own cases is 27 per cent

Simple short circuiting of the bile is certainly followed by longer life than when a radical operation is attempted in an unfavorable case. The apparently favorable case, in our opinion, is entitled to the chance of cure which is admittedly slim but cannot be disregarded The patients with a chance of cure are those with small tumors causing early jaundice and are, therefore as a rule the less impaired individuals

It is a formidable operation that no surgeon should undertake with only a casual acquaintance with the anatomy of the region. Accurate anatomic knowledge, preferably gained by a refresher course in the anatomy laboratory, including the performance of the operation on the cadaver the ability to use silk technic, expert anesthesia and a team to oversee in detail pre- and postoperative management are basic essentials for success in this procedure.

In conclusion it is emphasized that any adult with jaundice should be hospitalized promptly and have immediate steps taken to obtain as accurate a diagnosis as possible To allow such an individual to wait for three or four weeks in the hope that the jaundice will clear may result in just enough liver damage with its consequent effect on electrolyte and protein metabolism, to jeopardize a successful surgical result The radical operation is a formidable one the immediate shock of which can be handled Deaths which may occur after a week or so are due to physiologic disturbances that may be irreversible because of impaired liver and renal circulation but are often preventable by proper physiologic management during the postoperative period

We believe that it is fair to class this operation, from the standpoint of propriety with other radical procedures such as pneumonectomy The operation carries a definite mortality risk which should be not much above ten per cent whereas without operation the disease itself is 100 per cent fatal. We are convinced that as time passes there will be increased comfort for all survivors at the least, and at the best a number of cures that will compare favorably with the results of other operations of like magnitude that are now accepted as thoroughly justifiable

Discussion

Dr Frank Glenn, *New York City*—Dr Parsons' admirable presentation of radical operations on the head of the pancreas is complete and detailed The introduction of this operation by the Presbyterian Hospital group has marked a milestone in the treatment of lesions of the pancreas The mortality rate that accompanied the early operations has been reduced by the careful analysis of postoperative complications and deaths I agree with Dr Parsons that early hospitalization and proper diagnosis of jaundice is all-important if we are to receive these patients early enough to be ideal subjects for this extensive surgical operation Furthermore, I enthusiastically support his contention that the operation should not be embarked upon in the late stages of the disease where the operative mortality rate is extremely high and incomplete removal of the tumor more than likely

Some years ago at the New York Hospital, we reviewed a series of 38 patients with carcinoma of the pancreas who had either been operated upon or who had come to autopsy, and, therefore, had verified carcinomas of the pancreas We found in this series that the average duration of life between onset of the first symptom and death was slightly over nine months It seems to me that it is important to bear this in mind in selecting patients for radical surgery of the pancreas If the procedure is to continue in use, and I believe it will, the patients that we operate upon must produce a low postoperative mortality rate, and our operations must provide for a reasonable period of survival with increased comfort It is for this reason that the reporting of all cases of resection of the pancreas will enable us to evaluate the procedure properly We must be able to demonstrate a prolonged survival period, taking into consideration postoperative deaths as well as the degree of well-being and health achieved by those who survive

Further reduction of postoperative morbidity and, therefore, the mortality rate also depends in no small part upon a better understanding of electrolyte and water balance and our ability to meet any exigency, be it to increase the potassium ion or to replace a diminished blood volume Dr Parsons has properly emphasized the necessity of knowing exactly what the patient needs after such a radical operation, and the dangers of indiscriminate and uncharted therapy

I should like to make a plea at this time for one practice when a carcinoma of the pancreas is encountered by those not equipped to do a pancreatectomy, a cholecystostomy should be done to divert the bile to the exterior, rather than a short-circuiting operation which is almost invariably followed quickly by cholangitis Of course, when a radical procedure is not being considered, a short-circuiting operation is indicated

At the New York Hospital, our total mortality rate for resections of the pancreas for lesions in the pancreas, the ampulla of Vater, and the first and second portions of the duodenum is 27 per cent for a series of 22 cases Our mortality rate is rapidly decreasing with better understanding of the entire problem and the addition of modern accessories to surgery

With new procedures, such as those described by Dr Parsons, it is best that they be done only by those especially well equipped to do the work to prevent discredit being brought upon the procedure and thereby depriving certain patients of the only opportunity they may have to escape a fatal outcome

Reference

1 Bancroft, Frederic W and Wade Preston A Section on Diseases of the Pancreas, Surgical Treatment. Surgery of the Abdomen Philadelphia J B Lippincott Co , 1947 p 907

NEW FILMS AVAILABLE

The following films have been added to the Motion Picture Library of the American Medical Association and are available on a loan basis Moles and Melanoma (Navy Department), Plague Control (Navy Department), Clinical Malaria (Navy Department), Scabies, 1946 (British Information Services), Training of the Disabled (British Information Services), Surgery in Chest Diseases (British Information Services), Accident Service (British Information Services), The Medical Motion Picture, Its Development and Present Application (American Medical Association) The final sequence of this film is illustrated by a case of cancer of the thyroid with metastasis to the thigh. The use of the Geiger counter is demonstrated. Stitch in Time (Farm accident film for laymen)

Address your requests to Secretary, Committee on Medical Motion Pictures, American Medical Association, 535 N Dearborn Street, Chicago, Illinois

THE ROLE OF THE VAGUS NERVES IN THE MEDICAL AND SURGICAL THERAPY OF PEPTIC ULCER

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(From the Medical Department and the Surgical Service of Mount Sinai Hospital)

THE ultimate cause of peptic ulcer is as yet unknown, but it is probably a psychosomatic disease in most instances.[1] We believe that the immediate agent of the inflammation and ulceration is the acid peptic gastric secretion stimulated through the vagus nucleus and nerves We will confine our discussion to the role of the vagus nucleus and nerves in the ulcer problem and endeavor to demonstrate that they are in a hyperirritable state in patients with duodenal ulcer

Our early work proved conclusively that the nervous or cephalic vagus phase and not the chemical-hormonal phase of gastric secretion is increased in duodenal ulcer [2] Using histamine and bouillion to test the chemical phase we found no increase in the gastric acidity in ulcers over normals. However, sham feeding which of course, strongly stimulates the vagus reflexly did give a higher response in ulcer patients

In another series of studies, it was clearly shown that the nocturnal secretion of ulcer patients, representing the largest interdigestive phase of gastric secretion, is increased at least threefold in acidity and volume over that of normals.[3] With Drs. F Hollander and A. Cornell, we have carried out two series of studies in recent years which have convinced us of the correctness of these findings. Others notably Henning Chalfen, Valdes, Dragstedt, and Levin had confirmed this work. This observation is of fundamental importance and serves as a basis for two important modern medical and surgical advances in the therapy of peptic ulcer, i e the intragastric drip therapy and vagotomy Physiologists are in general agreement that the chief if not the only, stimuli for the night secretion are mediated through the vagus nerves

Recently Dr Manfred Hess and I completed a study of the irritability of the central dorsal vagus nucleus [4] This study was made possible by the following procedure If a marked hypoglycemia under 50 mg per cent is induced by 15 or 20 units of insulin given intravenously it is followed by an increased secretion of hydrochloric acid in the stomach This response measures the vagus nucleus irritability since it is definitely a central and not a peripheral reaction.

The proof of this is the fact that complete vagotomy or atropinization abolishes the gastric secretory response. The juice produced is highly acid and peptic and thus is similar to the typical vagal sham feeding juice Since we already had evidence that the response to sham feeding and the night secretion were increased in ulcer patients, we decided to study the function of the vagus nucleus in ulcer patients and controls with the use of insulin hypoglycemia as a test and the gastric acidity response as a measure. We used ambulatory uncomplicated duodenal ulcers and normal controls and also repeated tests in the same patients in many instances

We may summarize these studies by stating that both large (15 units) and small (5 units) doses of insulin given intravenously provoke a markedly higher acid response in duodenal ulcers than in normals. This seems to establish that the central vagus nucleus is hyperirritable to drops in blood sugar in ulcer patients. The evidence obtained from sham feeding and from the study of the nocturnal secretion suggests strongly that, in general, it is hyperirritable in ulcer patients.

It now seems necessary and desirable in ulcer therapy to turn our attention from the peripheral vagal activity usually attacked by the use of diet, alkalis, and the atropine group of drugs to the central vagus nucleus. Whether psychotherapy, central sedatives, shock therapy or some other methods will help to allay the vagus nucleus hyperirritability will we hope be disclosed in future studies. In any case insulin hypoglycemia now offers us an objective method of studying this central irritability It may indeed prove very difficult to change this irritability Repeated insulin tests in the same patient using various pharmacologic agents have failed to alter the acidity curves They seem strongly fixed for the given individual Tetraethyl-ammonium chloride seems promising in some preliminary studies, but this is admittedly a peripheral stimulus.

Another study which has some bearing on our subject is that of the persistent postoperative free acidity in 45 per cent of duodenal ulcer patients who have had a partial gastrectomy [5] Our studies revealed that this free acidity is readily provoked by sham feeding and completely abolished by atropine Once again we are forced to lay the blame for this unpleasant situation (since recurrent ulcer is frequent in this group) on the vagus nerves. Twenty years ago because

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of this finding, Berg, Klein, and I added anterior subphrenic vagotomy to the operation of partial gastrectomy for duodenal ulcer with a high preoperative free acidity [5] We obtained the strikingly good result of 76 per cent postoperative achlorhydria and no recurrence in that group

Five years ago, Dragstedt advocated complete bilateral vagotomy alone or combined with gastroenterostomy for the cure of peptic ulcer [6] We will return to that procedure later in the discussion

We have now stressed the importance of the vagus nerve and its central nucleus in the pathologic physiology of peptic ulcer Increased vagal irritability not only accounts for the increased day and night acid peptic secretion, but it seems highly probable that it also leads to increased peptic and motor activities and to hyperemia

What are the practical implications of these studies for ulcer therapy? Psychotherapy, central sedation, alkalis, atropine, and dietetic therapy are definitely indicated However, we found fifteen years ago, that all of these do not give us an adequate control of the harmful increased night secretion Even aspiration before retiring is of no avail We have, therefore, instituted and carried out during the past sixteen years the continuous intragastric drip therapy with milk-soda solution or diluted alumina gels, chiefly in refractory cases and usually at night [7] This has given us splended neutralization (pH 3 5 to 4 0), rapid healing, long remissions, and, most important, good results in patients who were refractory to the conventional Sippy type of therapy To date, we have found no other medical method of controlling the night secretion

As already noted, Dragstedt confirmed our findings concerning the night secretion He has based the operation of complete vagotomy chiefly on the fact that vagotomy is followed by a marked reduction in the acidity and volume of the gastric juice during the night He has recently reported an excellent result in a series of 417 cases of duodenal ulcer treated with subphrenic vagotomy, alone in most cases, and combined with gastroenterostomy in some obstructing cases

Our surgical group at the Mount Sinai Hospital, Drs R. Colp, P Klingenstein, and L Druckerman, have performed vagotomy, alone or in combination, in 126 cases to date These cases have been studied physiologically by F Hollander and clinically by V Weinstein and myself

Summary and Conclusions

In summarizing our experience with vagotomy we would like to state the following

1 There is rapid loss of pain and rapid healing which bears no definite relation to the completeness of the vagotomy as judged by Hollander's insulin test

2 We favor partial gastrectomy combined with vagotomy, since it gives the least motor disturbance and the highest percentage of postoperative nocturnal achlorhydrias (94 per cent)

3 We regard gastroenterostomy plus vagotomy less favorably and more in the light of an experiment

4 We are opposed to simple bilateral vagotomy alone because of recurrences and untoward symptoms resulting from the vagotomy

5 There is also the remote possibility of some future harm from interruption of the vagal supply to the other intra-abdominal organs

6 There is also the possibility of complete return of vagal function after several years Time and future studies alone will decide this

In conclusion, I wish to emphasize again that our studies suggest the idea that, irrespective of the ultimate course of ulcer, the vagus nucleus and nerves play a central role in the ulcer problem Medically, intragastric drip therapy is of considerable value, and, surgically, vagotomy seems important in the attack on the vagi Furthermore, our studies indicate that new and future therapeutic attacks should be directed chiefly toward allaying the hyperirritability of the central vagus nucleus

Discussion

Harry L Segal, M D, *Rochester*—Dr Winkelstein has emphasized the effect of stimulation of vagi nuclei upon the stomach through the vagi nerves, regardless of whether a conscious or subconscious conflict in a basically dependent person or some other mechanism is the cause of the central stimulation

In most patients with peptic ulcer, neutralizing substances, whether milk or otherwise, plus other well-known measures, are successful in healing the ulcers For controlling the night secretion, there is no doubt of the efficacy of the Winkelstein drip Unfortunately, it cannot have the wide usage it deserves, as it is not always a practical procedure in the home

Barring mechanical effects we might be able to heal medically many ulcers which now require surgery, if we were able, by some drug, to prevent the excessive psychic gastric secretion resulting from overstimulation of the vagi nuclei, i e, if we were able to perform a "medical vagotomy" of those branches of the vagi which supply the stomach This effect, however, can be attained by surgery by means of the operation called vagotomy

Since the latest and most thorough vagotomy era initiated by Dragstedt and his associates in 1943, the question in ulcer patients requiring surgery is whether we should continue subtotal gastrectomy, which to date has proved to be the operation of choice, whether we should merely sever the vagi alone, or whether we should combine vagotomy with

operations such as pyloroplasty gastroenterostomy, or subtotal gastrectomy

Subtotal gastrectomy although very successful, is a mutilating operation Transabdominal-supra diaphragmatic vagotomy is less dangerous and less mutilating than subtotal gastrectomy We realize that vagotomy produces motor disturbances in the gastrointestinal tract in a certain percentage of patients. This is also true in a few patients subjected to subtotal gastrectomy Furthermore, if vagotomy alone eventually proves to have detrimental effects upon other organs such as the liver pancreas etc. surely subtotal resection added to it will not eliminate them. It also does not appear advisable at this time to add the unknown factors of vagotomy to such a successful procedure in order to eliminate a marginal ulcer which occurs in less than 5 per cent after resection. If necessary the vagotomy can always be done later in that small group On the other hand if vagotomy alone should fail to prevent or cure ulceration in a few individuals a subtotal gastrectomy can also be performed later It is for these reasons that our surgeons have not chosen to combine vagotomy with subtotal gastrectomy for a primary duodenal ulcer It is generally agreed that a vagotomy alone will heal an ulcer which has occurred after subtotal gastrectomy gastroenterostomy or pyloroplasty

Since vagotomy alone results in distressing gastric stasis diarrhea, or so-called sewer odors in some patients a drainage operation other than resection is now performed by many surgeons in addition to the vagotomy A well-constructed pyloroplasty in the correct circumstances is more physiologic than a subtotal gastrectomy or gastroenterostomy The mucosa gastroscopically approximates the normal more frequently after pyloroplasty In some cases however the situation of the ulcer or the condition of the patient will make a gastroenterostomy a much safer procedure than either pyloroplasty or subtotal gastrectomy Vagotomy can readily be combined with it.

Even if vagotomy should prove to be effective on a permanent basis without untoward disturbances, there are certain ulcer patients in whom it is contraindicated. It should not be done for acute or impending acute perforations (the ulcer can perforate before the healing effect of the vagotomy can occur) for acute hemorrhage where, in the rare case surgery is necessary to stop bleeding in the psychopathic personality in whom ulcer is merely an incident and not threatening life or in gastric ulcer because of the inability to differentiate with absolute certainty between a benign and a malignant gastric ulcer

If a gastric ulcer case fails to heal medically within a short time it requires a subtotal gastric resection. Two exceptions have been mentioned by Dr Dragstedt. If the gastric ulcer is so high on the lesser curvature that a total gastrectomy will be necessary we can wait six weeks to learn the effect of vagotomy before subjecting the patient to a total gastrectomy This operation as is known results in a higher mortality and morbidity than subtotal resection If a gastric ulcer associated with an active duodenal ulcer does not heal medically the chance that the gastric ulcer is malignant is less than 1 per cent If for some reason such a patient is thought to be a poor risk, he can first be subjected to vagotomy with the understanding that a resection will be done if necessary

Vagotomy, either alone or combined with any other procedure is still in the experimental stage. In time more facts will accrue and we shall learn which of these operations is best for each particular situation as has already been realized in the case of the marginal ulcer

Asher Winkelstein, M D., *(Closing)* —Dr Segal has criticized the intragastric drip therapy characterizing it as *'impractical'* I would like to state that I have treated several hundred patients easily and successfully with the drip therapy Most patients take the soft latex tube easily since chronic ulcer patients are usually tube broken. The eagerness of my ulcer patients to take and continue the drip therapy may argue for a psychoanalytic implication or for a desire for pain relief which the drip affects so rapidly and completely If the treatment is induced gradually one or two hours the first and second day usually by the third day the patients take it easily themselves, either in the hospital or at home

I consider drip therapy of great importance and, therefore will take a little extra time for its discussion As I see it 75 per cent of uncomplicated peptic ulcers go through life with mild symptoms. Almost any form of therapy will relieve these patients However 25 per cent are refractory and comprise the so-called intractable group who often fall into the hands of eager surgeons. You will find if the intragastric drip therapy is used—and usually it is only necessary at night for a few weeks—that these refractory cases will lose their symptoms and heal quickly We have recently reported good results with the drip therapy in a group of 69 such cases. This is the real importance and great value of the continuous intragastric drip therapy This is now being generally realized throughout the country by experienced therapists.

We are not in favor of Dr Segal s idea of performing a subtotal gastrectomy alone first for duodenal ulcer and reserving the vagotomy if and when a recurrent jejunal ulcer occurs. The addition of vagotomy to subtotal gastrectomy is a simple and short procedure it increases the postoperative achlorhydrias to approximately 90 per cent and has shown no untoward symptoms to date in our series. This prophylactic vagotomy is better than the therapeutic vagotomy added later for a recurrent jejunal ulcer since in the latter instance, while it is successful in the majority of cases we have had failures and recurrences with that method of approach.

References

1. Winkelstein, A. and Rothschild L.: Am. J Surg. 151 523 (1932).
2. Winkelstein, A. Tr Am. Gastro-Enterol. Assoc. (1933)
3. Idem: Am. J Digest Dis. & Nutrition 11: 778 (1935)
4. Winkelstein, A. and Hess, M.: Tr Am. Gastro-Enterol. Assoc. (1948) In press.
5. Winkelstein, A., and Berg, A. A. Am. J Digest. Dis. & Nutrition 5 497 (1938)
6. Dragstedt L. and Owens, F M : Proc. Soc. Exper Biol & Med. 33: 152 (1943)
7. Winkelstein, A.: Modern Treatment of Peptic Ulcer New York, Oxford University Press, 1948.

THE CONSTITUTIONAL APPROACH TO MEDICINE

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DISEASE is a departure from normal function in the human organism It is not a new and parasitic life imposed on the patient from without but is his own life in altered form In the words of Rudolf Virchow, "The subjects of therapy are not diseases but conditions We are everywhere only concerned with changes in the conditions of life Disease is nothing but life under altered conditions" The disturbed function is the result of the interaction of forces, the algebraic sum of which is the disease we study Disease does not occur without a patient, and the factor common to all the diseases which beset him is the individuality of the patient himself

Some diseases appear to arise entirely from intrinsic deviations of the patient himself Such conditions as congenital heart disease and the inborn errors of metabolism belong in this group Others, such as severe physical injuries, seem to be governed entirely by the nature and severity of the external forces involved Actually, if the disease picture is considered dynamically, both factors must be understood in all diseases The longevity of the patient with congenital heart disease may be closely contingent upon the circumstances of his individual environment, just as the survival of a patient with a severe bullet wound may depend upon his innate ability to withstand loss of blood and resist the encroachments of infection If this is true even of these two extreme examples, it is far more applicable to the vast majority of diseases in which a delicate interplay between environmental and intrinsic factors determines the eventual outcome of the condition All disease (D) may therefore be considered to be composed of two variable components, the external (E) and internal (I) factors, so that $D = E/I$ If the numerator is large, the denominator need be slight or absent for the full development of the disease When we are concerned with a bullet through the heart or heavy exposure to carbon monoxide, we may reasonably neglect the individual factor But these are circumstances which produce almost instantaneous death by overwhelming assault In every condition in which death is not immediate and the course is prolonged, we must, perforce, consider the intrinsic factors involved in the pathologic process

If the denominator or individual susceptibility to the disease is great, the numerator need be correspondingly slight This is true even of the same disease in different people Thus, certain persons have a predisposition to tuberculosis and will incur this disease upon comparatively slight exposure to tubercle bacilli Others have stronger resistance, but no one is completely immune, since, if the exposure is great enough, it will overcome the resistance of anyone This individual component is present in all diseases, even when the extrinsic factor seems to be most clearly defined The individual resistance to similar vitamin deficiencies or industrial toxins varies as widely as does the individual susceptibility to tubercle bacilli, although the fact is not generally recognized Life insurance actuaries tell us glibly that of 100 people 25 will die of heart disease, 15 of cancer, 10 of hypertension and so on, but who can tell us which persons are likely to die of each disease? This is obviously governed by individual factors with each person, and it is the function of medicine to determine these factors Until this has been accomplished, preventive medicine will be restricted to the control of environmental forces and thus be correspondingly inadequate

The individuality of the patient is paramount, not only in the predisposition to disease but in the resistance to manifest disease It has been shown, for example, that if one of homozygotic twins has pulmonary tuberculosis while the other remains healthy, the prognosis in the afflicted twin is better than it would be if both had the disease [1] In the former case, heavy exposure temporarily overwhelms transiently lowered resistance in one with basically good resistance, on the other hand, if both twins are affected, the innate resistance is less initially

The importance of individual factors in the outcome of disease may be further illustrated by considering the case fatality from pneumonia Before the advent of chemotherapy, when this condition was treated without specific therapy, the case fatality rate was approximately 25 per cent, today it is about 7 per cent in most series of cases The sulfonamides and penicillin have thus reduced the case fatality rate by 18 per cent, a remarkable achievement Its very magnitude has, unfortunately, blinded many physicians to the fact that without any therapy worthy of the name 75 per cent of the patients formerly recovered and today 7 per cent still die despite the therapy used It is not possible to maintain that the outcome in these patients is determined by the virulence of the bacteria involved, since the disease has different outcomes in patients whose sputa contain bacteria of

apparently the same type and virulence The truth is that in 82 per cent of all cases of pneumonia the prognosis is determined, not by a wonder drug or a particular diplococcus, but by the intrinsic factors of the patient himself This is the situation in a disease which it is common to consider most completely under the dominance of the scientific physician.

These determining factors are spoken of collectively as the resistance of the patient. Physicians of a former generation were accustomed to consider them as much as they were able, and their remarkably accurate prognoses were based largely on their understanding of the patient's individuality Unfortunately, the course of modern medicine has led physicians away from this individuality to the detailed consideration of the environmental forces which prey on man The development of bacteriology and the great extension of the basic sciences in the investigation of disease has promoted the notion that illness is something dissociated from the patient himself The physician tends to discuss his patient's pneumonia or hypertension as if he were considering the cut of his clothes The practice is further encouraged by the habit of diagnosing in terms of syndromes and clinical entities. It is, therefore, not surprising if the patient himself objectifies his illness and looks upon it in the manner of a botanist considering mistletoe growing on an oak tree. The skilled botanist, however, is aware of the fact that mistletoe shows a predilection for the oak tree and apple tree but not for the elm or maple Likewise, the conscientious physician must be increasingly concerned with the individual factors of resistance in his patients. There are many physicians who genuinely believe that such factors are beyond the scope and powers of medicine, that they are too subtle and erratic for our discernment. Indeed, some even hint that the very attempt to analyse them smacks of dangerous mysticism. Such pessimism is unjustified there is no reason for believing that the study of the patient himself need be less scientific than the study of the extrinsic factors of his illness They are not it is true, amenable to investigation by the usual methods of the laboratory but that does not detract from their scientific validity The dangers of superstition are likely to be much greater when these intrinsic factors are ignored than when they are studied The simplification of medicine by the assumption that pneumonia in a patient is the same as pneumococci in a test tube will only retard its progress in the end

The study of the intrinsic factors of disease is best known by the name of constitutional medicine The constitution may be defined simply as the totality of the patient as an organism The term has been restricted by some to subsume only the factors of genetic origin which compose the genetic constitution or genotype of the individual [2] The genotype, however, is altered by other factors, the study of which is equally important On the one hand, it may be modified by the environmental or paratypical factors acting upon the patient throughout his life Thus a man may have a genotypical tendency to a medium body weight but a sedentary occupation, and a wife whose hobby is good cooking may amplify the original design to the point of obesity The genotype may also be altered by forces brought into play by the patient himself Determinists will deny the possibility of this, but it seems reasonable to consider separately those things which a person does for himself which counteract his genetic tendencies and environmental forces His chromosomal legacy may tend to impose obesity on a patient who may yet achieve thinness by self control A man who is naturally choleric in temperament may learn to control his emotional debauches. The genotype then is modified in varying degrees by these paratypical and idiotypical factors. The person who results from the interplay of these elements is the phenotype, the individual whose study is the interest of the constitutionally minded physician

The most important aspect of the constitution is its wholeness, for the patient is obviously greater than the sum of his bodily and mental organs The student of constitutional medicine constantly stresses this holistic concept of the organism and deplores the current approach to the study of human beings as a congeries of viscera Unfortunately the wholeness of the person can never be described adequately in words, it is never even completely known but only sensed in varying degrees according to the perception of the physician. It is probably best studied and described by a knowledge of the reactions of the whole organism to different external stimuli Individual aspects of the constitution may however be described adequately and often quantitatively This division into parts is necessary for the study to be made at all, it is permissible if we remember that the whole organism is composed of the different fragments analysed and, what is more important that these fragments are all modified by the totality of the organism They are as much a result as a cause of this wholeness

The particular investigations of the constitutionally-minded physician are designed to assist him in the detection of those characteristics of a patient having one disease condition which are distinguishable from those of another patient with a different manifestation of disease He is concerned not only with the fact that one patient has

peptic ulcer and another hypertension but with all the other factors which these two patients do not have in common

In the pursuit of this information he pays particular attention first to the heredity of the patient, which may be one factor predisposing him to particular illnesses He is interested next in the detailed personal history of the patient which will demonstrate the influences operating upon the patient from his environment and the modifications which the patient has himself been able to make in the pattern outlined for him by heredity and environment It is, however, in the examination of the patient that the constitutionally-minded physician may differ most from his colleagues In the physical examination he is concerned not so much with the manifestations of disease as with the physical individuality of the patient Detailed anthropometric studies have shown, for example, a tendency for persons of certain bodily builds to be more susceptible to particular diseases than other persons The scope of investigation has more recently been extended to include physiologic, biochemical, and even cellular studies with no less fruitful results [3 4] Patients with peptic ulcer, for example, tend to show physiologic deviations in the cardiovascular as well as the gastrointestinal system, for it has been found that they show a higher than average incidence of slow heart rates and prolonged P-R intervals in the electrocardiogram [5] In the psychologic panel the investigations are now frequently subsumed under the title of psychosomatic medicine, yet the psychiatrist, like the anthropologist, is simply trying to elucidate those characteristics of the patient which predispose him to a particular illness

A brief example of the manner in which some of these investigations may be linked can be given In any individual over a period of time there is a remarkable constancy of blood lipid values if nothing is done to alter this [6] The importance of this may be appreciated when it is remembered that there are significant correlations between high blood lipid values and coronary artery disease [7–9] Further, there seems to be a relationship between blood lipid values and body build [10] There is a possible relationship between body build and coronary artery disease and a definite one between cardiac disease and body build, although the latter observation is open to two interpretations of causality [11–13] Further, psychiatric studies have shown also the importance of personality factors in coronary thrombosis [14] As these relationships are further refined it will be possible to gain additional insight into the nature of coronary artery disease In the meantime, one can see, even if dimly, the importance of constitutional factors in this disease One can also discern the makings of a new preventive medicine no less significant than that concerned with epidemics of infectious diseases

The objectives of constitutional medicine may be illustrated further by a consideration of peptic ulcer That there is a definite correlation between the occurrence of gastric ulcers, bodily configuration, and personality is denied by none The long, lean face and large, narrow chest of these patients are familiar to every physician These impressions have been confirmed by actual measurements of height-weight ratio, gonial angle, subcostal angle, and other anthropometric indices The correlation between the measurements and the susceptibility to the disease is about 75 per cent [3] If the purpose of constitutional medicine were only to add another piece of diagnostic data to the large armamentarium of the physician, the contribution would not be very great, the radiologic diagnosis of the condition is perhaps 90 per cent accurate as far as the mere detection of an ulcer crater is concerned The problem, however, is more complicated than this Medicine seeks not only the discovery of disease but its explanation and prevention To this the radiologist can contribute little or nothing The student of constitutional medicine, on the other hand, interests himself in the predisposition to disease His objectives are the discovery of those persons who are vulnerable to certain conditions and the explanation for their vulnerability He seeks to know why these particular patients reacted in the particular way necessary for the production of peptic ulcer Other people are subject to the same stresses without acquiring peptic ulcers The investigator of the constitution is, therefore, concerned with discovering the particular psychologic and physiologic reactions which result in hypertension in one patient, bronchial asthma in another, and peptic ulcer in a third, when the environmental stimuli are the same

It is obviously incorrect to say that the bodily habitus or the personality of the patient produced the ulcer The bodily habitus and personality are two outward and obvious manifestations of the constitution of the patient A third manifestation of that constitution is the disordered reactivity which is responsible for peptic ulcer It is this functional deviation, rather than bodily habitus, for which patients with peptic ulcer will show a correlation of 100 per cent, and it is its discovery which is the ultimate objective of the investigations of constitutional medicine It is perhaps surprising, but nevertheless fortunate, that these patients show such an excellent correlation with regard to bodily habitus and personality pattern These correlations can be used in the

detection of the *locus minoris resistentiae* in susceptible persons before the actual disease develops. The study of these relationships, by illuminating deviations in the patient, aids also in the search for the immediate causal disorders of psychologic and physiologic function which have produced the ulcer. Thus the inductive analysis may greatly assist the more conclusive deductive process.

Constitutional medicine can also assist our understanding of the reactions of the patient to developed disease. When we speak of the severity of a disease we may mean one of two things. The term may be used to describe an extreme manifestation of the overt signs and symptoms of disease, such as the evidence of extensive consolidation of several lobes in pneumonia. It may also be used, however, to describe the effect which the local disease has on the organism as a whole. Clearly, the severity of this effect is all important in the outcome of the disease. Unilobar pneumonia from which a patient dies is obviously more severe than multilobar pneumonia from which he recovers. Yet we have so far no means of gauging this quality of severity, and the art of individual prognosis has made little progress in the era of scientific medicine. The means of developing this art lie in the careful study of individual psychologic and physiologic reactions to disease; from this study we may eventually be enabled to distinguish more accurately those manifestations of illness which are serious and harmful from those which are unimportant or favorable. The student of constitutional medicine advocates the abandonment of diagnostic labeling and syndrome medicine because "clinical entities," while commonly appearing in case reports, do not exist in patients. Such concepts may help us to classify our patients, but never to understand the subtle qualities which lead to recovery in one and to death in another patient apparently suffering from the same "entity." It would be preferable to substitute some scheme of biologic analysis which aims at the understanding of the whole person and the different components of his illness, for this illness must be seen as his life in a new form rather than as an object separate from him (Fig. 1).

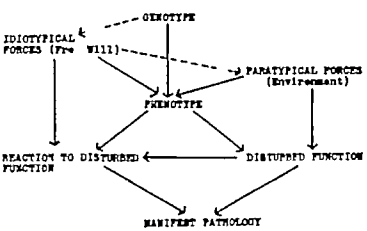


FIG. 1.—Scheme for the biologic analysis of constitution and disease.

The study of the individual patient as the principal agent of his disease is only just beginning to recover from its neglect during the ascendancy of bacteriology. We are slowly relearning that the assistance of natural recuperative powers is no less important than the development of specific treatments aimed at the "disease entity." No treatment can be more specific than the resistance of the individual to his disease and it is this resistance which is the study of constitutional medicine.

References

1. Roberts, J. A. F.: An Introduction to Medical Genetics, London, Oxford University Press, 1940.
2. Bauer, J.: Constitution and Disease, New York, Grune & Stratton, 1942.
3. Draper, G., Dupertuis, C. W. and Caughey, J. L., Jr.: Human Constitution in Clinical Medicine, New York, Paul B. Hoeber Inc., 1944.
4. Draper, G., Ramsey, H. J. and Dupertuis, C. W.: J. Clin. Investigation, 23: 804 (1944).
5. Draper, G., Brueun, H. G. and Dupertuis, C. W.: Am. J. M. Sc., 194: 154 (1937).
6. Turner, K. B. and Steiner, A.: J. Clin. Investigation, 18: 45 (1939).
7. Rabinowitch, I. M.: Ann. Int. Med., 8: 1436 (1935).
8. Barker, N. W.: Ibid., 13: 685 (1939).
9. Willius, F. A.: Proc. Staff Meet. Mayo Clin., 14: 751 (1939).
10. Gildea, E. F., Kahn, E. and Man, E. B.: Am. J. Psychiat., 92: 1247 (1936).
11. Levine, S. A.: Clinical Heart Disease, 2nd ed., Philadelphia, W. B. Saunders & Co., 1942.
12. Pearl, R. and Ciocco, A.: Human Biol., 6: 650 (1934).
13. Ciocco, A.: Human Biol., 8: 39 (1934).
14. Dunbar, Flanders: Psychosomatic Diagnosis, New York, Paul B. Hoeber Inc., 1943.

WANTS WIDE-OPEN FIELD FOR PSYCHIATRISTS

An all-out program of extracurricular activity for psychiatrists has been proposed by Dr. Carl A. Binger. He wants them to put in their oars at every level of public activity, from the local school board to the United Nations. Doctor Binger says psychiatrists should act as trouble-shooters when things go wrong at U. N. meetings, help diplomats understand each other even storm the fastnesses of the State Department. And he adds: Perhaps diplomats could get some training in psychiatry or psychiatrists some experience in diplomacy.—*Medical Economics, July 1948.*

peptic ulcer and another hypertension but with all the other factors which these two patients do not have in common

In the pursuit of this information he pays particular attention first to the heredity of the patient, which may be one factor predisposing him to particular illnesses He is interested next in the detailed personal history of the patient which will demonstrate the influences operating upon the patient from his environment and the modifications which the patient has himself been able to make in the pattern outlined for him by heredity and environment It is, however, in the examination of the patient that the constitutionally-minded physician may differ most from his colleagues In the physical examination he is concerned not so much with the manifestations of disease as with the physical individuality of the patient Detailed anthropometric studies have shown, for example, a tendency for persons of certain bodily builds to be more susceptible to particular diseases than other persons The scope of investigation has more recently been extended to include physiologic, biochemical, and even cellular studies with no less fruitful results [3 4] Patients with peptic ulcer, for example, tend to show physiologic deviations in the cardiovascular as well as the gastrointestinal system, for it has been found that they show a higher than average incidence of slow heart rates and prolonged P-R intervals in the electrocardiogram [5] In the psychologic panel the investigations are now frequently subsumed under the title of psychosomatic medicine, yet the psychiatrist, like the anthropologist, is simply trying to elucidate those characteristics of the patient which predispose him to a particular illness

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consideration the preconceived ideas of the patient and explain to him in simple terms the presence of any anatomic or functional abnormality which does not make any particularly desired change feasible There should also be a definite understanding of the definition of any technical terms used It is surprising how often a patient speaks of the length or shortness of the nose when referring to the degree of profile elevation.

Most intelligent patients can be made to understand that each case presents a particular problem and that the surgeon must be guided by his own judgment and by any limitations which may exist on account of anatomic abnormalities The patient who makes unreasonable demands, which, in the judgment of the operating surgeon cannot be met, is best left alone

Before and after photographs of comparable cases are of definite help in making the patient understand the possibilities and the limitations which exist in the individual case Freehand sketches of a proposed result usually exaggerate the actual operative possibilities and thus glamorize the anticipated result, furthermore, the exact replica of a model agreed upon may never be attained in vivo [4]

The patient should also be told about the type of anesthesia used, the slight discomfort to be endured and the length of time he or she will have to sacrifice from his or her normal activities The amount of postoperative swelling and ecchymosis is another individual factor which cannot be predetermined

When the doctor and patient cannot meet on common ground and the patient made to understand that there are possibilities for improvement but limitations to perfection, that patient should be tactfully refused

Type of Nasal Deformity

The ideal nose for correction from the point of view of the plastic surgeon is the "hump" nose (Fig. 1) this is usually accompanied by excessive length of the nose, excessive width of the nasal bridge, and frequently by some bulbousness of the nasal tip This general type, then providing the skin is thin and of good quality, lends itself most suitably to correction of all the defects enumerated. On the other hand, a similar nose with a pseudohypertrophy due to sebaceous thickening of the integument and subcutaneous tissues presents a less satisfactory prognosis. A fact frequently overlooked is that a major defect not only lends itself more freely to correction from a technical point of view, but that the more startling degree of change obtainable proves most gratifying to the patient. A more satisfactory and indeed startling transformation may at times be attained by a concomitant surgical procedure to correct a receding or prognathic chin (Fig. 2) Minor defects of the nose however which some patients want corrected present a more difficult problem Not only must each step of the operation be carried out with the most meticulous exactitude but the final result must pass more severe standards of esthetic perfection

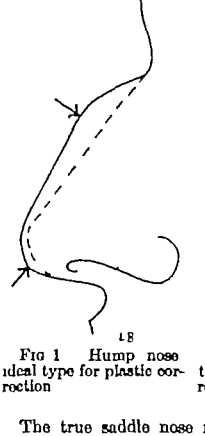


FIG 1 Hump nose ideal type for plastic correction



FIG 2 Chin corrections to further cosmetic results.

The true saddle nose needs the addition of tissue—the implantation of a graft—and it may be categorically stated that this type of operation is less satisfactory in the achievement of symmetry of line and smoothness of contour than are procedures involving reduction of profile (Fig 3)

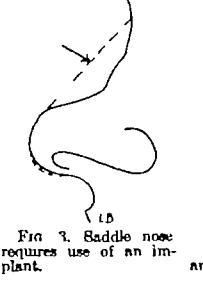


FIG 3. Saddle nose requires use of an implant.

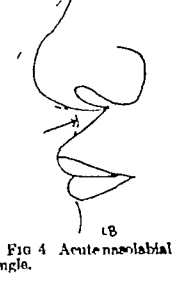


FIG 4 Acute nasolabial angle.

POTENTIALITIES AND LIMITATIONS OF CORRECTIVE RHINOPLASTY

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(*From the Hospital for Joint Diseases*)

THE purpose of this paper is to propose and discuss prognostic criteria governing successful end results in corrective rhinoplasty When the popularity of cosmetic procedures for the correction of nasal defects has increased to such an extent that they appear on many daily operating schedules, it is timely to discuss a few general indications and contraindications, as well as some of the anatomic limitations which cannot be circumvented by either impeccable surgical technic or unimpeachable artistic criteria This paper will restrict itself to corrective rhinoplasty which does not involve the replacement of skin lost through trauma or disease It is felt that by curbing the indiscriminate and injudicious selection of cases the number of operative disappointments can be kept to a minimum, at the same time avoiding the placing of a stigma upon an operation which proves of great benefit to so many patients

While the psychologic aspects of patients undergoing plastic surgery have been widely discussed, the prognosis from an anatomic and structural point of view has been neglected [1–3] In actual practice, it has been submerged because of a reluctance to discourage the prospective patient I cannot overemphasize the importance of discussing with patients the surgical limitations which are due to definite anatomic shortcomings More patients will be satisfied with their result if they have been apprised beforehand of the degree of improvement which they can expect The criteria which follow are, of course, merely prognostic, for distinct and marked improvement can be obtained even in cases without the ideal qualifications An attitude, feigned or naive, that promises perfection and does not recognize structural limitation is indefensible, particularly in the face of ever-present adventitious factors such as excessive cicatrization, adhesions, unresolved hematomata, periosteal proliferation, graft absorption, etc To these, even the time-tested Joseph technic or its modern modifications are not immune

Personality Evaluation

It is obviously impractical to make a detailed psychiatric study of the average patient who desires an esthetic improvement of a nasal deformity Virtually the same conclusions can be reached by a few well-chosen questions at the time of consultation The flagrant neurotic, groping for a panacea, who attributes his shortcomings to a misshapen nose rather than to uncompensated drives, will not be permanently helped, this type of patient will soon find fault with the operated organ or, likely as not, will blame some other facial feature for his or her inadequacies An individual who merely happens to be dissatisfied with or self-conscious about his or her nose, but in whom this feeling does not constitute part of a psychic symptom complex, is a much safer prospect The line of demarcation is frequently not readily discernible, especially when the surgeon is obliged to make a decision about whether an operation is advisable after only a single interview Furthermore, since it is a well-known fact in plastic surgery that the degree of satisfaction a patient has with his result is not in direct proportion to its excellence, a careful estimation of both the anticipated esthetic result and the type of individual involved is of paramount importance Men are by far more easily satisfied with their results than are women, a gratifying fact in view of the increased number of men patients This is partly traceable to the recent global conflict, where many men suffered ridicule because of their deformity or visualized keener competition for jobs in the postwar world

People in the theatrical world are, as a group, most appreciative and generally present few psychologic problems, for their prime purpose in having the operation is economic, they are seldom resentful, even if a secondary revision becomes necessary in order to attain the best possible result

An interesting insight into the patient's mental attitude may be gained by asking what prompted his determination for a rhinoplasty Experience has shown that patients who themselves express the desire for a nasal operation tend to adjust more satisfactorily than those who act as a result of repeated suggestion by others

Physician-Patient Relationship

After careful examination of the external deformity of the nose and a determination of the presence or absence of any complicating factors within the nose, the surgeon should be able to impart to the patient a fairly good conception of what changes he deems necessary to improve the appearance of that organ He should take into

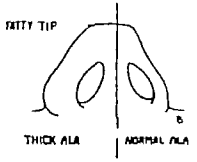


FIG 8. Technical obstacles fatty tip thick alae.

clay, can never be rendered delicate through surgery, although some thinning at the base of the nostril can be accomplished without visible scars (Fig 8) Wide nostrils, due to alae that are attached too far laterally onto the cheek giving the nose a broad base, can be corrected by narrowing the floor of the nostril, but mutilating external incisions in the nasolabial groove should be avoided. Nostrils deformed by a protruding subluxated lower end of the septal cartilage are amenable to correction by surgery, but the flattened nostrils and asymmetric alar attachment accompanying congenital cleft lip deformities cannot always be satisfactorily corrected.

Just as the graceful lines of the normal columella defy reproduction in reconstructive work, so are cosmetic procedures hampered by a retracted columella, or even by one that is on the same plane as the lateral nostril wall (Fig 6) The columella tends to become further retracted in these cases because of the pull exerted by the septocolumellar sutures employed in the shortening of the nose. On the other hand wide grooved, and drooping columellae can be corrected with gratifying results. Some minor postoperative asymmetries will be detected following a rhinoplasty, and patients are prone to point these out, unaware of the fact that differences (within normal limits) exist whenever one compares the two sides of the face

Condition of the Skin

After eliminating major dermatologic disease in general, and specifically those conditions with a predilection for the skin of the nose such as rhinophyma and its precursor acne rosacea lupus, etc , one is confronted with a goodly number of patients whose nasal skin presents large pores filled with sebaceous matter, a number of others have minor acneiform conditions and telangiectases Patients with large pores or those who previously have had excessive x ray treatment present definite limitations to surgical procedures Corrective rhinoplasty of the hypertrophied nose essentially involves a decrease in the size of the osteocartilaginous structures This permits the overlying skin, previously undermined to shrink down and to reattach itself to the smaller framework beneath. Large-pored skin is markedly deficient in this contractile power and, therefore does not adapt itself smoothly to the underlying framework. Further more, the dilated follicles impregnated with sebum and bacteria, penetrate to a sufficient depth so that they may be injured in the course of the undermining, notwithstanding meticulous dissection This may initiate a folliculitis with residual cicatrization, which may adversely affect the final result

Mobility of the Nose

The muscles of the nose are mostly rudimentary The principal ones are the compressors and dilators of the nostrils, involved in controlling the intake of air, and the elevators and depressors of the alae nasi In most people the shape of the nose is not altered appreciably by the muscles of expression In others, a pull exerted by the upper lip during speech is reflected in the frequently noted up and down bobbing of the nasal tip Surgical overcorrection—overshortening—will usually suffice to negate the muscle pull in this minor type of nasal mobility In pronounced cases, in which one notes, when the patient talks, smiles, or laughs, a definite drooping of the tip over the upper lip together with an elevation of the alar attachments and widening of the base of the nose, the strong muscular action persists postoperatively, tending to re-establish the previous appearance (Fig 9) Repeated corrective surgical shortening may become necessary at times in order to remedy this recalcitrant condition.



FIG 9 Effect of overactive muscles of expression.

Age of the Patient

The importance of resiliency of the skin in rhinoplasty has already been discussed Older individuals lose this contractile power and, therefore, present some surgical limitations, they may require additional undermining of the skin in order to secure the maximum amount of shrinkage The degree of relaxation of the skin, then has a definite influence in limiting the maximum age at which a rhinoplasty is advisable.

The minimum age for surgery also varies General developmental maturity rather than the actual age of the patient is a safe criterion Mental attributes auguring cooperation on the operating table should be discernible. Severe septal obstruction, congenital or traumatic, and frac-

Unpredictable factors transcending the question of a "take" come into play, e g , the degree of bone or cartilage absorption, the thickness of the fibrous encapsulation that forms about the graft (unavoidable even in nonbiologic implants), the firmness of the supporting structures, and the surgical limitations as to the size of the recipient pocket

Similarly, nasal defects where the nasolabial angle is acute, due to trauma to the anterior nasal spine or to the septum, or as part of "dish-face" deformity incident to underdevelopment of the superior maxillae, are among those exhibiting a deficiency of contour (Fig 4) It is necessary, in most cases, to provide a substitute for the septal spine or to advance the upper lip and the deeply attached alae by the use of cartilage implants or V-Y incisions in the oral sulcus [5]

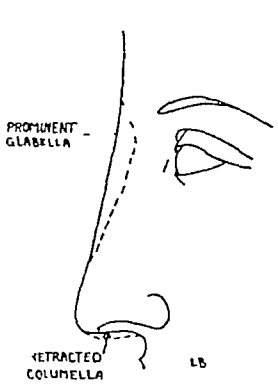


Fig 6 Deterring factors lack of glabellar indentation, retracted columella

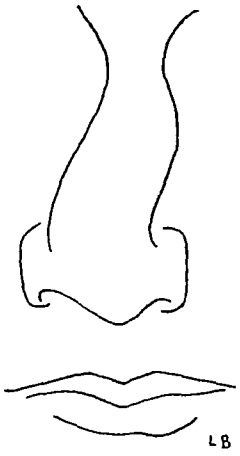


Fig 7 Twisted tip due to septal deviation

Structural Adaptability, The Septum

While actual operative experience with a multiplicity of nasal defects may be a prerequisite to a finer evaluation of anatomic shortcomings, even the inexpert eye can recognize many of the conditions briefly alluded to below

Osteocartilaginous Defects —A very wide nasal bridge accompanied by thick bony structures will look massive even after infracturing the lateral walls and reducing the size of the nose (Fig 5) Some men are under the impression that the thickness of the bony structures can be reduced by rasping Such a procedure will result in excessive callus formation and defeat its own purpose Similarly, gross asymmetry incident to nasal bone fractures or contributed by callus formation will often be reflected by some degree of inequality following a rhinoplasty

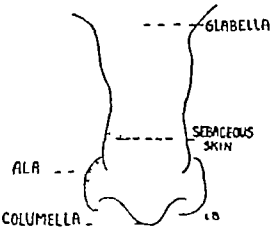


Fig 5 Deterring factors excessively wide nasal bridge, sebaceous skin

The straight frontonasal line present in cases with a prominent glabella can be only partly eliminated, for excessive undercutting and rasping in this area might incur trauma to the frontal sinuses above (Fig 6) A very long nose, due to excessive elongation of the nasal septum, will frequently require a secondary shortening following the original correction because of relaxation and stretching of tissues artificially placed under undue tension In fact, structures approximated under tension by adhesive tape or sutures will, in general, fail to maintain that position permanently

The deviated septum presents a problem in many rhinoplastic procedures A mildly deflected septum that causes no respiratory embarrassment before a rhinoplasty may cause symptoms following the narrowing of the bridge, done in virtually every case involving bony defects, and the patient should be warned of the possibility that a submucous resection might become necessary at a future date The occasional case where this occurs does not warrant the adoption, routinely, of a surgical procedure upon the septum However, any obviously obstructing septum should be corrected prior to the plastic as a separate procedure, or concomitantly by those who maintain that both procedures can be done at one sitting without incurring undue trauma Not only is the plastic operation impeded by a severe septal deflection, but a more severe respiratory impairment is likely to ensue unless the obstruction is eliminated A twist at the lower end of the septum, just posterior to the columella, can be eliminated by amputating the lower end of the septum in the course of shortening the nose However, when the deviation involves a great extent of the cartilaginous dorsum so that it produces a twisting deformity of the tip, a completely satisfactory correction is difficult to obtain (Fig 7) (Total removal of septal support and reimplantation of cartilage, as advocated by some for this type of case, permanently removes the structural solidity of the nose and jeopardizes most other procedures undertaken to obtain the desired outline for the new nose)

Soft Tissue Defects Around the Tip —It may be safely stated that a very large tip is less adaptable to correction than is a large hump, for in the latter case the undermined excess of skin can shrink and adjust itself over a wider area (Fig 8) A cleft tip cannot always be corrected without some residual evidence of that condition. Thick alar attachments, being made of tissue and not of

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Since chorea is a highly variable disease, no therapeutic study is convincing unless a fairly large number of cases is included, and unless comparison is made with cases in the same series in which patients were treated by other methods This report is based on a study of 243 cases from the Strong Memorial and Rochester Municipal hospitals over the period of fifteen years from 1930 to 1945 There are 107 of these cases in which the diagnosis is unquestioned, the records are complete, and but one form of treatment was used during one hospital admission

The attacks of chorea are classified according to the plan outlined by Barnacle.[4] Those listed as mild had intermittent limited choreiform movements, usually without grimaces or speech defects Those listed as moderate had more choreiform movements, some grimaces, and some speech defects. Those listed as severe had continuous widespread movements, grimaces, definite speech impediment, and some cases were violent.

Phenylethylhydantoin was administered by mouth in doses of 0.25 Gm per day for the younger children, and 0 9 Gm per day for the older ones. Dosage was continued daily until the onset of the eruption usually from seven to ten days If there was no reaction the drug was usually discontinued after fourteen days The patients were hospitalized during the entire course of treatment.

Results

In 'nirvanol sickness ' the sedative effects of phenylethylhydantoin usually appear on the second or third day of its administration Fever usually develops on the seventh day reaches a maximum on the ninth day, and subsides on the eleventh day The fever can be prolonged by the continued administration of the drug beyond its onset. On the ninth day a few reddish brown maculopapules appear on the thighs wrists, or abdomen the face often appears swollen and flushed, and a pale pink enanthem may appear on the soft palate or buccal mucosa. By the next day or so the exanthem has become general It is usually distinctly morbilliform but somewhat more urticarial than the rash of measles Itching may be intense Occasionally, the rash is punctate or resembles that of scarlet fever

Girls outnumbered boys in a ratio of 1 5 1, a rather unusual finding The average age was nine years The youngest was four years and the oldest was fifteen

Of those treated with phenylethylhydantoin, seven (12.5 per cent) failed to show an exanthem, six others who failed to show it had either previously or subsequently developed an eruption during administration of the drug Five of the seven without rash were afebrile, but only one of these failed to respond to treatment.

"Nirvanol sickness" does not always result as a response to administration of the drug nor do the fever and rash appear to be essential for successful treatment of chorea Six patients had scarlatiniform and seven had urticarial, instead of the usual morbilliform, eruptions. In each of eight cases, more than one type of rash appeared. Usually, these were of two types either a scarlatiniform rash on the fifth day followed in five days by a morbilliform eruption, or the typical morbilliform eruption on the sixth to ninth day followed in one or two weeks by an urticarial rash Three of the eight patients showed an exanthem after the first dose of a second course of the drug Eosinophilia, mild leukopenia, and relative lymphocytosis generally occurred in patients with the typical exanthem Figure 1 shows typical morbilliform eruption due to phenylethylhydantoin. Figure 2 shows an urticarial rash

In none of our cases did persistent harmful effects develop One girl developed a rash resembling exfoliative dermatitis. Reported harmful effects from phenylethylhydantoin are as follows agranulocytosis, hemorrhagic nephritis delirium dyspnea associated with swelling of the tracheobronchial nodes, subcutaneous hemorrhages edema of the bronchial mucosa with bronchial hypertonus stomatitis, edema of the lungs with cardiac embarrassment and the discomfort attending the usual reaction [6–12]

Influence on Chorea

The primary sedative action of phenylethyl

ture deformities can and should be corrected even if the ossification centers are still active, but manipulation should be kept to a minimum lest growth be interfered with [6] Cosmetic rhinoplasty in the very young should be limited to those individuals developing definite neurotic tendencies directly traceable to their nasal defect In these cases, the possible need for further surgery at maturity should be made clear to the parents

Previously Operated Cases

A certain proportion of patients will require small secondary corrections in order to satisfy their expectations completely This may consist of a slight increase in tilt or the correction of slight asymmetry which appears more obvious than that encountered in normal features The surgical correction can, for the most part, be accomplished satisfactorily and usually without a breakdown of the physician-patient relationship, emphasis on the minor character of the procedure is self-evident, and an attitude of "leave well enough alone" on the part of the surgeon is advisable, for the passing of time is in his favor Occasionally, a second surgeon is sought for this correction, again usually to the ultimate satisfaction of the patient

There is also the greatly increasing number of surgically mutilated patients, who almost invariably expect too spectacular an improvement to be wrought by the next surgeon they visit They fail to realize the greatly increased difficulties and hazards in such an undertaking and usually prove ungrateful, even following excellent reparative procedures

Finally, there is the patient with an apparently satisfactory surgical result, but the victim of an erroneous personality evaluation, who forsakes the original operator and fanatically seeks further plastic procedures Such operations are occasionally performed by some unwary surgeon without any fundamental benefit to the patient but with an ensuing vociferous rancor toward all surgeons involved These patients, unable to adjust themselves to their new appearance, have received a psychic trauma which only occasionally is mitigated by the passing of time and by repeated compliments concerning their appearance Sometimes they are in need of psychotherapeutic treatment

Summary

An effort has been made to give an insight into the problems involved in corrective rhinoplasty and to enable a physician either to advise or discourage prospective patients because of his familiarity with their psychic make-up The surgical potentialities in the various types of nasal defects have been enumerated, and a knowledge of these would also be of great benefit to his patient

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References

1 Barsky, A. J Am. J Surg. 65 288 (Aug) 1944
2 Straith, C L. J Michigan M Soc 31 18 (Jan) 1932
3 Baker, W Y , and Smith, L H. J A.M.A. 112 30 (Jan. 28) 1939
4. Safian, J Plastic & Reconstr Surg. 2 463 (Sept.) 1947
5 Byars L T Surg , Gynec & Obst. 84 65 (Jan.) 1947
6 Peer, L A. Arch. Otolaryng. 44 715 (Dec) 1946

REHABILITATION FOR THE TB PATIENT

Successful rehabilitation requires a comprehensive and effective sanatorium program and close cooperation between the sanatorium and the community All the community services must be integrated to serve the patient and family during all the phases of treatment, from the time of diagnosis until the individual is fully adjusted. Under these conditions patients will accept sanatorium care, remain till their tuberculosis is arrested, and follow through with necessary rehabilitation plans —*American Review Tuberculosis, January, 1947*

MATERNITY DEATH RATE DOWN

The risk of dying during childbirth decreased during 1946, according to figures of the National Office of Vital Statistics In that year, 5,153 women died in the United States from causes related to pregnancy and childbirth, representing a maternal mortality rate of 1 6 deaths per 1,000 live births, as compared with 5,668 deaths and a rate of 2 1 in 1945

The national maternal mortality rate has been declining steadily, beginning with 1930 The rate in that year was 6 7, or over 4 times as large as the rate in 1946 —*Ohio State Medical Journal, July, 1948*

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Influence on Chorea

The primary sedative action of phenylethyl



Fig 1 Morbilliform rash due to phenylethylhydantoin



Fig 2 Urticarial eruption due to phenylethylhydantoin

hydantoin in chorea is slight When the characteristic "nirvanol sickness" appears, choreic manifestations become exaggerated When the rash and fever begin to disappear, choreic symptoms rapidly subside The subsequent course of the disease is definitely shortened Since all the records were reviewed by one individual, the observations recorded in the two larger series should be comparable

For the severe cases, the average duration of chorea from the beginning of treatment to recovery was twenty-six days when phenylethylhydantoin was used and seventy-seven days when other drugs were used The latter group includes two cases in which the duration was shortened by extraordinary means one by a concurrent acute sinusitis, the other by a rash and fever from phenylethylbarbituric acid

For the moderate cases, the average duration of chorea from the beginning of treatment to recovery was twenty-five days when phenylethylhydantoin was used and forty-three days when other drugs were used

There was one failure in the cases treated with phenylethylhydantoin and nine failures when other drugs were used Forty-two to seventy days is the reported duration for chorea [13] A duration of seventy or more days without recovery is considered a failure in this study The average duration of chorea from the beginning of treatment to recovery was sixteen and one-half days when hyperthermia was used There were no failures

In a group of 25 severe cases treated with phenylethylhydantoin, ten experienced recurrence of the disease, in a group of 33 moderate cases, seven recurred The total was 17 recurrences among 58 cases under continued observation There was a total of 15 recurrences in a group of 45 cases treated with other drugs There were no recurrences in the group treated with hyperthermia

The group treated with hyperthermia compares favorably with those reported in the literature [14–19] The group treated with phenylethylhydantoin compares favorably with the series reported in the literature [2 3,10–12 20–29] Weisman and Leslie tabulated the first six references listed and found the average duration was twenty-five days, with 29 failures in 178 cases [14–18] The last three references listed had approximately the same time period and 22 failures in 187 cases In one series of six cases, all were failures, and all but two of these later responded to typhoid vaccine therapy [29]

In our entire series, 51 children (47 per cent) eventually had some evidence of carditis, i e , an altered electrocardiogram, an enlarged heart, or a permanent murmur

Comment

The mechanism of "nirvanol sickness" is obscure Nothing similar has been observed in animals In rabbits, large doses (from 10 to 20 times that used in man) have led to exhaustion of the bone marrow and agranulocytosis [3] Schick has reported on the toxicity of the optical isomers of phenylethylhydantoin [5]

There is a similarity to serum sickness that has been noted by many authors the frequent eosinophilia, the exanthem, and the occasional desensitization. The sudden shift from alkalosis (during the early administration of the drug) to acidosis at the time of the febrile reaction has been thought to be a significant feature of its mode of action [21]

Undoubtedly phenylethylhydantoin is not specific in its action on chorea, since there are many other ways of producing a similar result

The ease of administration, the absence of untoward reactions in our series, the failure of the drug to have a deleterious effect on coexisting carditis in this and other series, and the greatly shortened course of the disease seem to warrant the use of phenylethylhydantoin in moderate and severe chorea

Phenylethylhydantoin does not produce results so rapidly as does hyperthermia, especially that produced by typhoid-paratyphoid vaccine, but the sedative effect, the requirement of less highly trained personnel, and the safety with which repeated courses may be given are advantages in the use of "nirvanol" not possessed by all types of hyperthermia.

Summary and Conclusions

1 Sixty-six cases of Sydenham's chorea treated with phenylethylhydantoin are compared with 51 cases treated with various other drugs

2 Phenylethylhydantoin proved to be more effective than other drugs in the treatment of chorea The duration of the disease was reduced approximately one half There were fewer failures, but recurrences were not significantly prevented

3 Although "nirvanol sickness" may cause temporary discomfort, no permanent harmful effects were noted in this series.

4. Because of the possible danger to bone marrow, frequent blood counts should be made in patients treated with phenylethylhydantoin

5 The administration of the drug should not be continued after the appearance of the eruption, nor for more than fourteen days.

6 There were no harmful effects on treated patients with active carditis

The phenylethylhydantoin used in this study was supplied by R. J Strasenburgh Company Rochester New York.

References

1 Roeder F.: Therap. Monatsh. 33: 54 (1919)
2. Poynton, F J and Schlesinger B.: Lancet 2 257 (Aug.) 1929
3. Ray H. and Cunningham, J.: Am. J Dis. Child. 39: 1205 (June) 1930.
4. Barnacle, C. H. Ewalt, J R. and Ebaugh, F G.: J.A.M.A. 109: 113 (July) 1937.
5. Schiek B. Sobotka, H. and Peck, S. M. Am. J Dis. Child. 45 1216 (June) 1933
6. Peer E.: Monatsehr f Kinderh. 42: 157 (1929)
7 Majerus, K.: Deutsche Ztschr f. Nervenh. 63 312 (1918–1919)
8. Metzdorff K.: Deutsche med. Wehnschr 52: 528 (1926)
9 Pils K.: Arch. f. Kinderh. 82: 210 (1927)
10. Silber, I. B. and Epstein J W Arch. Pediat. 51: 373 (June) 1934
11. Pileher, J D and Gerstenberger H J.: Am. J Dis. Child. 40: 1239 (Dec.) 1930.
12. Montfort, J A.: *Ibid.* 47: 1269 (June) 1934.
13. Gibson, S. Brennemann s Practice of Pediatrics, Hagerstown, Maryland W F Prior Co. Inc. Vol. 11 Chap. 18, p. 20, 1943.
14. Weisman, D and Leslie, C.: New York State J Med. 36: 1557 (Nov 1) 1936.
15. Sutton, L.: J A.M A. 97: 299 (Aug. 1) 1931
16. Sutton L. P and Dodge, K. G.: J Pediat. 3: 813 (Dec.) 1933.
17. Capper A. and Bauer E. L. Am. J M. Sc. 186: 390 (Sept.) 1933.
18. Aab, R. and Einhorn, N Am. J Dis. Child. 50: 879 (Oct.) 1935.
19 Neyman, C. A. Blatt, M. L. and Osborne, S. L.: J.A.M.A. 107: 938 (Sept. 19) 1936.
20. Dennet, R. H. and Wetchler S.: J Pediat. 1: 203 (Aug.) 1932.
21 Schwartzman, J and Grossman, L.: Arch. Pediat. 60: 194 (Apr.) 1943.
22. Marick, S. W.: J Pediat. 4: 242 (Feb.) 1934.
23. Whitaker W M.: Arch. Dis. Child. 5 44 (Feb.) 1930.
24. Ashby H. T.: *Ibid.* 5: 42 (Feb.) 1930
25. Greenwald, H. M. and Greenberg, B.: Arch. Pediat. 58 48 (Jan.) 1941
26. Marick, S. W.: *Ibid.* 48 525 (Aug.) 1931
27 Call, H. R. J Indiana M. A. 27: 216 (May) 1934.
28. Tisdall, O R.: Arch. Dis. Child. 5: 397 (Dec.) 1930.
29 Weinfeld G F., and Cohen, R.: J Pediat. 1: 210 (Aug.) 1932

SALES TALK

Every now and then the physician has to sell an idea that he knows the patient won t relish but that is necessary for the patient s good—like submitting to a major operation or committing a loved one to a state hospital or moving to another part of the country

How to get compliance?

One colleague we know has given a lot of thought to his approach If an operation is his aim he may suggest it in this way

"I could promise you that the prescription I've just given you will work a miracle. I could then tell you to go home and stop worrying But you re too intelligent to believe it. I'll lay my cards on the table therefore and say frankly that while this prescription will help you temporarily, an operation is your only hope for permanent relief

This approach reflects two cardinal principles of successful selling It flatters the person s intelligence and it anticipates his objections Thus it lessens his resistance.

What sets it apart from ordinary selling is the fact that service to the patient, not profit to the entrepreneur, is the driving motive behind the approach. But human nature being what it is, the gambit is as handy in the consultation room as along a Fuller brush route.

—*Medical Economics August, 1948*

THE ACCIDENT-PRONE PATIENT

MARION NORRIS GLEASON, Rochester, New York

DURING the last twenty-five years a concept of accident causation and prevention has been developing that may have as great an influence on the public disability and death rates as the discovery of the sulfonamides and penicillin The concept is that repeated accidents are symptoms of physical and emotional disorders which, in many cases, can be diagnosed and treated clinically In other words, if a person has repeated falls, bumps, cuts, or similar injuries, he suffers from a predisposition to accidents and should seek medical help, just as he should if he suffers from joint pains, chronic indigestion, or a neurosis Otherwise, sooner or later, he will very likely suffer a major injury which may cripple or kill him.

Pasteur divorced the unhappy couple, accidents and disease, when he made the discovery that bacteria were the cause of certain infections This started the great public health drive toward universal freedom from epidemic disease and diverted medical research and practice from the wide areas of speculation and metaphysics into narrower paths through laboratories equipped with microscopes and test tubes But the accident problem still remained a matter of demoniac luck or divine correction

Then Robert Koch presented his theory of immunization, and epidemiologists like Charles Chapin established the practical application of this theory Soon the downward trend of the terrible death rate due to epidemic diseases was apparent on the public health charts, but, with the growing control of contagious diseases, statisticians watched the rising rates of disability and death due to accidents climb into the spaces left by smallpox and yellow fever There was a tremendous reduction in child mortality from diphtheria and dysentery, but shocked public health officials saw that accidents were rapidly becoming the number one killers of children and young people

The first successful attempt to make a scientific study of the accident-prone personality was undertaken in England in 1919 by Greenwood and Woods, investigators for the British Industrial Health Research Board [1] They established, on a statistical basis, the fact that about 20 per cent of the people have most of the accidents, while the remaining 80 per cent are comparatively accident-safe

Since then, many similar studies have been made, implemented largely by industrial and insurance groups, with traffic bureaus actively interested Despite many confusing variables which make a correlation of such work difficult, there has been a general agreement with the original findings of Greenwood and Woods, and the ratio of 20 to 80 between the accident-prone and the accident-safe remains

A wealth of material has been written on accident-proneness William Hollis, formerly research associate of the New York University Center for Safety Education, and now senior safety engineer of the Los Alamos Scientific Laboratory, Los Alamos, New Mexico, has over 1,000 titles in his bibliography of literature on accident-proneness and related subjects The following quotation is from Boyd Fisher's widely used book, *Mental Causes of Accidents,* published in 1921 "Accident hygiene is like prescribing for sick people individually, as their causes require Public health does everything possible to preserve the health of the whole community Private medicine, nevertheless, finds much illness to treat that cannot be prevented in a wholesale way And so, too, we find that after we do all of the accepted things in safety work, we still have accidents arising out of special circumstances affecting individuals, and we must supplement general safety devices by prescribing a special kind of safety medicine After we treat men for accidents growing out of traits in which they are alike, we must treat them for accidents growing out of traits in which they differ "[2]

To Dr Flanders Dunbar of the College of Physicans and Surgeons, Columbia University, can probably be credited the first statistical medical approach to the personal factors back of accidents In her pioneer studies of 1,600 fracture cases at Presbyterian Medical Center, she demonstrated that the prevention of accidents is the concern of the medical profession In her book, *Psychosomatic Diagnosis,* she says, "Accidents are an important factor in public health " Further, "Physicians have hesitated to study the problem of accident-proneness, perhaps because of the difficulties inherent in it—although it is no more baffling than the problem of cardiovascular disease—or perhaps because, like everyone else, they have assumed that accidents always happen by accident "[3]

Dr Dunbar's studies were confirmed by Drs Jurgen Ruesch and Karl Bowman at the University of California Medical School, where they used 256 cases of head injuries for their work. They report, "Analysis of the circumstances of the accidents as a whole reveals that only a minority of the injuries were caused by accidental, unfavor-

able circumstances. The majority were caused by factors which bear on the character of the injured subjects."[4]

At the other extreme of the psychosomatic field where we find physical factors are stressed, the following opinion has been expressed by Dr I Pearse, coauthor of *The Peckham Experiment*, in which are described studies made of 4,000 families at the Pioneer Health Center in London "In our opinion the primary cause of accident-proneness is physical disorder If you have studied the recently published *The Peckham Experiment* you will see that, taking our population to be a reasonable sample of the general population of this country, there were 90 per cent of the people with some disorder Only 20 per cent of the individuals studied by us were aware of their disorder, that is to say, suffering from disease or disability I cannot think that any action pattern to be observed in leisure time is not equally to be seen in working time, and if this were fully investigated it would not turn out to be closely related to accident-proneness."[5]

Many industries have been successful in using this concept to reduce accidents among employes. The result generally has been a gratifying drop in the on-the-job accident rate. However, reaching individuals in the homes and on the farms, where there is little supervision or mechanical protection, has been a problem presenting discouraging difficulties Furthermore there has seemed no way to attack the appalling accident death rate of preschool children except by educational drives for parental carefulness.

Last year a comparatively simple procedure with wide sociologic implications was outlined by Dr Richard Jaenike of the University of Rochester School of Medicine and Dentistry Dr Jaenike, a clinical psychiatrist, has been interested for some time in the study of slight petit mal and psychomotor attacks of epilepsy as a possible cause of many unexplained accidents This was his practical and humane suggestion "A complete medical, psychological and neurological examination given to accident repeaters, especially children, might reveal not only the disorders of which the accidents are symptoms, but other hidden disorders as well Such a thorough examination, followed by the proper therapy should enable the patient to leave an accident clinic better prepared in every way to lead a happier and healthier life An accident clinic also would have the practical advantage of attracting a public that still frequently rejects the idea of a psychiatric interview or a brain wave test for possible epilepsy"

As a result of this suggested solution to a baffling problem, considerable discussion has taken place among various specialists as to how such a medical accident clinic could be set up and it now seems a matter of a few months before one or more clinics for accident repeaters will be established.

In discussing the implementation of clinical procedures for the accident-prone, it has been necessary to accept the fact that such a patient presents a sociologic as well as a medical and psychiatric problem Fortunately, the wide acceptance of the theory of psychosomatic diagnosis and therapy by lay people as well as by the medical profession enables the study of the accident-prone personality to fit very well into the pattern of the concept that the emotional and environmental background of an ill person must be considered along with the study of the patient's actual disease To paraphrase Dr Fred Shattuck, "It is more important what kind of a fellah has an accident than what kind of an accident the fellah has"

Dr William L. Bradford, professor of pediatrics at the University of Rochester School of Medicine and Dentistry, was one of the first specialists to make clinical use of Dr Jaenike's theory The following example of one of Dr Bradford's cases provides an excellent illustration of the principles involved in the clinical detection and treatment of accident-proneness, especially in the preschool child

A three-year-old boy was brought to Dr Bradford's office with a cut in his forehead After the injury had been treated Dr Bradford questioned the mother and found that the child had an accident history of many tumbles, bumps, and bruises. The boy was given an orthopedic examination which revealed knock knees and weak ankles Simple exercises and lifts in his shoes were prescribed, and the boy was no longer afflicted with repeated falls.

Further discussion of the case brought out the fact that the weak ankles and knock knees were caused by malnutrition. This condition, in turn, was the result of the child's being so spoiled that his eating habits had suffered. The emotional factors back of this situation brought the case into the psychiatric field The question may well be raised here as to how a general practitioner, who might readily make the proper diagnosis of the causes back of his patient's repeated injuries due to accidents, could offer a therapy that requires psychiatric procedures. Dr Jaenike again gives an encouraging answer to this problem

With accidents a miss is frequently as good as a mile and there is often a hair-line difference in space or a split-second difference in time between a near accident and an injury Even a small amount of insight into the cause of a person's accident-proneness either physical or emotional, can often provide the slight amount of restraint

or care that might prevent an accident from taking place

In discussing the setup of a clinic for accident repeaters, besides routine pediatric and medical examination, the following factors have had special consideration.

Instruments (Ortho-Rater and Sight-Tester) have been perfected which can detect visual defects contributing to an individual's accident-proneness These instruments can be operated by trained laymen, and accidents in one industry have been reduced directly or indirectly about 20 per cent through the use of this device Hearing losses can also be detected by a similar instrument (Audiometer) which is designed for the use of trained laymen

It is possible that such instruments, operating in a mobile unit through rural farm areas, could do much to reduce the number of accidents caused by buzz saws, axes, and smaller tools Visual and auditory defects of farmers' wives and children could also be detected and a visit to an ophthalmologist or otologist be recommended

A study has been made of a number of elderly pedestrians who have been hit by autos, and they were found to have almost complete occlusion of hearing due to hardened wax in their ears This condition is often found where there is a tense and nervous personality, particularly in older people

From public health nurses have come reports of children and two cases of older people who suddenly commenced to stumble and fall with increased frequency One case was reported of a boy who not only started to fall down stairs frequently but up stairs as well His medical history revealed a recent slight infection which was given a postdiagnosis of poliomyelitis A muscle grading test was given, and the weakened muscle found and trained back to better control

The history of Dr Bradford's case described previously covers only one type of orthopedic accident-proneness Dr Bradford suggests that public school physical education teachers and nurse teachers could spend time profitably studying the correlation between postural defects in children and repeated accidents

Pharmacology and toxicology are two of the most needed fields for medical research and patient education in clinical safety work Here is a case reported by Dr J G Fred Hiss of Syracuse Dr Hiss is a cardiologist, and a patient was referred to him as needing a specialist's care When he first saw her, she was hospitalized and was in such a disorganized state she needed constant attention, as well as high boards at the sides of the bed to prevent accident After examination which revealed no organic heart trouble, Dr Hiss inquired about medications she was receiving He ordered all medication stopped The next day she was normal and ready for discharge

Between 1925 and 1935, at the Massachusetts General Hospital, one out of every four cases of poisoning was attributed to therapeutic drugs, and last year at the Strong Memorial Hospital of Rochester, New York, with a census of about six hundred patients, it was estimated that one admission a day was related to an overdosage of prescribed medications *

The number of admissions to hospitals of patients in a disorganized state suffering from bromide poisoning is high and is of special interest to safety workers, since bromide poisoning may keep the patient accident-prone for from three to four months

Traffic bureaus could well make a study of the effect of barbiturates on alcoholics It might be found that the sedative had as much to do with drunken-driving accidents as the alcohol, or that, in combination with the alcohol, it was at least a contributing factor

It may well be argued that the good medical practitioner has been treating accident-prone patients clinically for years, and that an accident clinic is only a new angle or a different focus on an old procedure But sometimes a new focus is necessary when a need is great

The motivating philosophy behind this approach is well expressed by Dr Lydia G Giberson, industrial psychiatrist of the Metropolitan Life Insurance Company "Safety, again, as I see it, is a sign of positive coordination, a sweetness of physical and mental health, the adaptation of a twentieth century adult to his industrial environment It is extremely important to remember that all of the environment must be considered, for man lives, breathes, and works as a unit Safety is a humane consideration and a grace accruing to a really decent civilization "[6]

130 Gibbs Street

* The census of the adjoining Municipal Hospital is included in this figure

References

1 Culpin M. Lancet 1 1739 (May) 1934.
2 Fisher B Mental Causes of Accidents, Boston Houghton-Mifflin Co 1921 p 251
3 Dunbar F Psychomatic Diagnosis New York, Paul B Hoeber Inc., 1943 p 169
4. Ruesch J and Bowman, K. Am. J Psychiat. 102 148 (Sept.) 1945
5 Pearse I. Personal communication to Mrs Ethel Hendriksen Office of Health Education, New York State Department of Public Health.
6 Giberson G Presented at the 17th Annual Safety Convention of the Greater New York Safety Council Inc., March 28 1947

Ortho-Rater produced by Bausch and Lomb Company Rochester, Sight-Tester by American Optical Company, Southbridge, Massachusetts and Audiometer by the Audio Development Company, Minneapolis, Minnesota.

Case Reports

DIPHTHERIA INFECTION OF THE SKIN OF THE FEET

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ALTHOUGH a rather cursory review of the literature reveals a great many references to cutaneous diphtheria practically all these reports are found occurring among military personnel [1-3] Since diphtheria of the skin is apparently such a rarity in civilian practice it seems worthwhile to present a single case.

Case Report

A 12-year-old boy was admitted to the Brooks Memorial Hospital, Dunkirk, on the private service of Dr J R. LaPaglia, in the early morning of October 17 1947, with convulsive seizures and a slow pulse. He had had sore feet of about two weeks' duration preceding his admission. There was on the left foot a large ulcerative area elliptic in shape, measuring about 5 inches in length and about 3 inches at its widest point, extending along the medial aspect of the foot from the base of the hallux anteriorly almost to the heel with a circular black crusted area about 1½ inches in diameter opposite the metacarpophalangeal joint which looked like a gangrenous area of skin somewhat resembling a burn which had been coagulated with tannic acid This crust which was tightly adherent to the underlying tissue had a U-shaped defect near its periphery which was covered with yellowish-gray exudate. There was a smaller ulceration on the right foot, also elliptic in shape located on the medial aspect of the big toe, resembling that on the left foot but without the gangrenous appearing crusted area.

At the time of admission, the pulse was 30 blood pressure 80/40 and temperature 100 F The skin was cold and clammy He appeared to be in a state of shock. Tonsils and pharynx appeared normal with no injection or evidence of exudate. No cervical glands were palpable. Deep reflexes were exaggerated. Heart sounds were weak with the rate being 28 to 32 per minute. Convulsive seizures occurred at intervals, particularly upon stimulation produced by touching him.

The history as obtained indicated that the boy had been limping for about two weeks before his admission to the hospital because of painful feet. The lesions on the feet started as a slight scratch on each foot. From these scratches blisters had developed which spread on the left foot from the big toe over the dorsum and around the medial aspect to the plantar surface almost as far back as the heel, that on the right foot was confined to the medial aspect of the big toe. He was seen at the doctor's office on October 10 1947, six days before his admission at which time the blistered and raw areas with necrotic tissue were cleansed and treated with sulfathiazole powder Rest and hot packs were prescribed. He was not seen by the physician again until about 2 00 A.M., October 17 1947 at which time the child was having convulsions and the slow pulse was noted Immediate hospitalization was ordered.

The tentative diagnosis before and on admission to the hospital was toxemia due to tetanus bacillus infection with complete heart block. After testing for sensitivity with tetanus antitoxin treatment was started with small doses reaching a total of 100 000 units by 4 00 P.M October 17, 1947 Also beginning shortly after his admission penicillin was started with a dosage of 30 000 units every three hours. This dosage was continued through October 20, 1947, to a total amount of 930 000 units of penicillin.

Also shortly after admission a culture was taken from the base of the U-shaped defect in the gangrenous area, inoculated on a Loeffler s slant and taken to the Chautauqua County Laboratory A spread made from the swab was examined and the opinion given that the organisms were very suspicious for Corynebacterium diphtheria in morphology This was confirmed by the examination of the growth on the Loeffler slant. On the basis of this information treatment with diphtheria antitoxin was begun about 5 00 P.M , October 17, 1947, with intramuscular administration in dosage of 10 000 units every three hours until 50,000 units had been given by 6 00 A.M October 18 1947 with an additional 10 000 units at 6 00 A.M October 19 1947 making a total dosage of 60 000 units of diphtheria antitoxin. Also on October 17 1947 5 000 units of diphtheria antitoxin were used locally on the wounds and another 5 000 units were also applied to the feet on October 20 1947

On the morning of October 18 1947 the patient's general condition was very poor, temperature was 101 F pulse ranging from 32 to 38 and respirations 40 to 48. However in the afternoon of that day the pulse began to increase in rate and improve in quality respirations became slower temperature declined, and his general condition improved. From that time his general condition remained good. His pulse rate increased to 72 to 80 and the lesions on the feet healed rapidly under local medication with sulfathiazole ointment and later cod liver oil ointment.

Laboratory Data.—Examination of the blood on admission showed a red blood cell count of 4,650 000 hemoglobin 94 per cent color index of 1 01 white blood cell count 15 100 80 per cent polymorphonuclear cells and 20 per cent small lymphocytes. On October 23 1947 the white cell count was 11 800

Urinalysis on admission showed a specific gravity of 1 027 acid, albumin 1 plus sugar 1 plus, and a few squamous cells white blood cells and bacteria on microscopic examination. Another urine specimen on October 23 1947 showed specific gravity of 1 010 alkaline, albumin 1 plus, no sugar and a moderate number of white blood cells on microscopic examination. The swab smear from the lesions on the feet was highly suspicious for diph-

theria. The culture from this same source, taken October 17, 1947, was positive for diphtheria bacilli Repeated nose and throat cultures were negative, as were subsequent cultures from the skin lesions

Progress.—When first seen, the lesions on the feet appeared as described above and apparently were very painful and tender When seen again on October 30, 1947, the patient's improvement in general condition had continued The feet were no longer painful, and there was considerable evidence of healing On the left foot the crust had apparently dropped off, and the only area covered by granulations was that which had previously been gangrenous in appearance The rest of the foot was covered with newly formed skin. On the right foot epithelization had proceeded from the edges, and a much smaller area than that previously described remained opened, raw, and covered with granulations

The patient's condition continued to improve, and he was discharged from the hospital on November 16, 1947, as recovered

Epidemiologic.—There was no history of his ever having received diphtheria immunization There was no history or evidence of sore throat or nasal discharge in the patient or in any other member of his household. This boy was accustomed to take walks through the fields and woods near his home which was located near the outskirts of the city About a week preceding the onset of painful feet he had been in a swampy area and had soaked through his shoes to his feet, following which a slight scratch or break in the skin occurred on each foot, on the left opposite the metacarpophalangeal joint and on the right along the medial aspect of the hallux.

Nose and throat cultures were taken on the other members of his household, other contacts being denied These comprised his father, mother, and five brothers These cultures were negative for diphtheria bacilli with two exceptions The culture from throat of a brother, A. W, aged fifteen, was positive for diphtheria bacilli, and a culture from the nose of another brother, N W, aged ten, was positive There was no clinical evidence of diphtheria in either of these brothers, therefore, it appears that they were carriers, although it could not be determined whether they or one of them was responsible for the infection of the feet or whether they became infected from the skin infection

Comment

Cutaneous diphtheria is apparently an unusual condition in civilian life, although it is not uncommon in military practice, especially in the Mediterranean area and in the Near East References to myocardial complication such as was seen in this case are found in the literature Neuritic complications which apparently are more likely to occur were not observed in this case

The rarity of cutaneous diphtheria in civilian practice may well be more apparent than real It is quite possible that the routine culture of many skin lesions might reveal that infection with Corynebacterium diphtheriae is more common than is generally realized

To illustrate this, reference can be made to a familial outbreak of diphtheria in August and September, 1945, in Hornell The mother, the first case recognized and diagnosed, had pharyngeal diphtheria A newborn infant in the family was found to have a diphtheritic membranous infection of a circumcision wound which preceded in onset that of the mother's pharyngeal infection A third case occurred in the family in a seven-year-old boy, this being pharyngeal diphtheria Subsequently, the father, who was a captain in the military service, was found to have a deep, infected, unhealed wound of the back of the left hand and left arm, which was called "jungle rot," but which, when cultured, was found to be positive for Corynebacterium diphtheriae Virulent diphtheria bacilli were isolated on culture from each of these cases, including the infected circumcision wound in the newborn infant

The indicated treatment is the use of diphtheria antitoxin intramuscularly and, if necessary, intravenously Use of penicillin as local application has been recommended but was not used in this case Diphtheria antitoxin as a local application was used more or less empirically in the treatment of the case, but, subsequently, reference to its use was noted in the literature [4]

The convulsive seizures which were thought to be due to tetanus infection were probably due to cerebral anoxia resulting from the bradycardia

References

1 Saffron M. H. Arch. Dermat & Syph 51 337 (May) 1945
2 Gill S *ibid* 49 408 (June) 1944.
3 Cameron J D S and Muir E G Lancet 2 720 (Dec. 19) 1942
4 Records of New York State Department of Health

Acknowledgment is made to Dr J R. LaPaglia Dunkirk for permission to report this case and to Dr E Bieber Health Officer for his cooperation in securing cultures from the family

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DIME-SIZED AREA IN BRAIN IS CONSCIOUSNESS CENTER

A dime-sized area in the very middle of the brain is the brain center for consciousness Location of this area was announced by Drs George N Thompson and J M Nielsen of the University of Southern California, at the meeting of the American Medical Association in Chicago

If this dime-sized piece of brain is destroyed, as by a blood clot, hemorrhage or tumor, the patient loses consciousness He goes into a deep coma and while he may live on for several days or even three weeks, he does not recover

Patients who sleep for prolonged periods, as in so-called sleeping sickness, or encephalitis, probably suffer damage to this seat of consciousness but not destruction of it, Dr Thompson said.—*Science News Letter, July 3, 1948*

GANGRENE OF THE HAND FOLLOWING TRAUMATIC OCCLUSION OF THE RADIAL AND ULNAR ARTERIES

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(From the Surgical Service of Harlem Hospital)

ACUTE arterial thrombosis may result from varied forms of trauma, chief of which are penetrating and puncture wounds, fractures, contusions, crushing injuries and prolonged or repeated pressure. Lowenberg reported a case of thrombosis of the radial, ulnar and brachial arteries following a crushing injury of the thumb in a machinist who had been accustomed to using a "vibratory chipping hammer."[1] There were subjective and objective signs of arterial insufficiency but without resultant tissue devitalization. Perry and Allen described two cases of acute arterial thrombosis of the lower extremity with gangrene each following a single blunt injury in a patient with normal arteries.[2] Anderson reports occurrences of arterial thrombosis with intact adventitia following injury to the artery by bullet or shell fragment.[3] Evidently, in such instances, the penetrating missile transmitted sufficient force to disrupt the intima and not the adventitia with resultant thrombosis. Instances of axillary artery thrombosis due to repeated pressure by a crutch have been described by Platt and by Leriche and Stricher.[4,5] LeFevre reported the case of a sixteen year-old boy who after having been struck in the calf by a golf ball developed chronic arterial insufficiency of the leg.[6] Schör and Neff described two cases of segmental thrombosis of arteries at the wrist complicating trauma.[7] The exact pathology in both instances was discovered when they were mistakenly operated upon for stenosing tenosynovitis.

Case Report

F. L., an adult white man, aged 38, was admitted to the hospital on November 11, 1945. The patient gave a history of having been addicted to the use of codeine for the preceding five years. He had been accustomed to the self-administration of two grains of codeine four times a day intravenously. One week prior to admission he made such an injection on the anterolateral aspect of the left wrist. The following morning he felt tingling, burning, and coldness in the left hand. Two days later a bluish purple discoloration appeared on the tips of the fingers which subsequently extended up the fingers on to the hand. The patient admitted to having smoked two packs of cigarettes a day for ten years.

Physical Findings.—Blood pressure was 140/98, pulse 88, respirations 24, temperature 98.6° F. The patient appeared poorly nourished but in no acute distress. The pupils were equal and reacted strongly to light and accommodation. The skin over the shoulders, chest, and arms presented light brownish patches characteristic of tinea versicolor. Both lower extremities exhibited many small scars, the results of repeated skin punctures and cutaneous abscesses.

The skin over the terminal phalanges of the second, third and fourth fingers of the left hand was black, shrunken, and cold. There was a bluish discoloration of the proximal portions of these three fingers, the entire first and fifth fingers, and the palm of the hand including the thenar and hypothenar eminences. These areas of discoloration were hypesthetic to light touch and pinprick. The dorsum of the hand was slightly discolored. Motion in the wrist and fingers was painful and partially restricted, the fingers having been held in moderate flexion. The left forearm appeared normal in color but was decidedly cooler to touch as compared to the right side. Neither a radial nor an ulnar artery pulsation was felt. A normally pulsating brachial artery could be palpated down to its bifurcation in the antecubital fossa. Over the middle of the dorsum of the wrist a small pulsating artery was palpable presumably a branch of the posterior interosseous artery. The surface temperature and arterial pulses were normal in the right upper and both lower extremities.

Laboratory studies which included a complete blood count, urinalysis, blood Wassermann test, and blood sugar were all within normal limits.

Oscillometric Readings.—Left arm above elbow registered 3; right arm above elbow 6; left forearm above wrist 1; and right forearm above wrist 3.

Clinical Course.—On November 17, 1945, a left stellate ganglion block was performed with no subjective or objective improvement. The line of gangrene had become more clearly demarcated. On November 21 the left stellate ganglion block was repeated. Shortly after this procedure the patient became moderately dyspneic and complained of pain in the left chest. A chest roentgenogram taken on the same day disclosed a left pneumothorax with partial collapse of the lung. This pneumothorax disappeared spontaneously within ten days. This second stellate ganglion block also failed to afford relief.

On November 23 an arteriogram was made: 18 cc. of 35 per cent diodrast being injected into the distal third of the brachial artery. This showed a complete absence of the radial and ulnar arteries distal to the bifurcation of the brachial artery (Fig. 1). A small interosseous artery extending from the elbow to the wrist could be visualized. X-ray of the wrist revealed an abnormal irregularity and denseness of the scaphoid bone, the cause of which was not clear.

On November 25 it was noted that the fifth finger had also become gangrenous. Gangrene was complete from the tips to the middle of the second, third, fourth, and fifth digits. The proximal halves of these digits and the thumb were reddish-blue with bleb formation. The palm appeared blotchy with patches of skin gangrene except over the thenar eminence. The dorsum of the hand was warm and possessed good color. By January 30, 1946, clear lines of demarcating gangrene had formed at the interphalangeal joint of the thumb and the proximal interphalangeal joints of the other four fingers. Amputation of the gangrenous digits at these levels was performed. The patient was discharged from the hospital on May 20 with the amputation stumps partially healed but clean and granulating. There was ankylosis of all the metacarpophalangeal artic-



FIG 1 Arteriogram taken nineteen days after the trauma Diodrast, 25 cc, injected into the distal third of the brachial artery visualized only the posterior interosseous artery

ulations The palm had undergone considerable atrophy and replacement fibrosis A roentgenogram revealed marked generalized atrophy of the bones of the hand and wrist Although the hand exhibited such degenerative changes, it was considered cosmetically and functionally preferable to an amputation at the wrist

Comment

Several unusual facts present themselves in this case. Foremost is the occurrence of an acute arterial occlusion in the forearm following a supposed intravenous injection of codeine The patient had been a narcotic addict for many years, having changed from morphine to codeine because of the difficulty in obtaining the former The exact nature of the material last injected was unknown The patient stated that he received the same satisfactory response as on previous administrations An additional fact is the inclusion of arterial thrombosis as a complication occurring in "main-line shooters" Local abscesses, erysipelas, cellulitis, phlegmon, tetanus, malaria, and syphilis have all been known to occur There is no other reported mention of arterial thrombosis or embolism complicating such inoculation Codeine per se is not known to have any local irritating effect upon the vascular walls sufficient to cause local thrombosis, nor does it possess a vasospastic action that might initiate arterial occlusion We may be correct in postulating that the trauma of the needle puncture initiated the thrombosis

The history and clinical findings together with the arteriogram presupposes that a retrograde thrombosis of the radial artery and an orthograde thrombosis of the ulnar artery had occurred It is known that thrombosis of an artery ordinarily extends up to the next proximal bifurcation Thrombosis of the bifurcating branch is unusual. Whether the involvement of the ulnar artery was an extension of the thrombosis from the radial artery or secondary to an embolus from the site of the bifurcation is conjectural From the behavior of this case it would appear that the radial and ulnar arteries combined behaved as terminal arteries The collateral circulation afforded by the interosseous artery and other superficial arteries was not sufficient to maintain viability of the part However, in the case reported by Lowenberg, where the radial, ulnar, and brachial arteries were occluded, no gangrene ensued [1] The thrombosis involving the ulnar artery was sufficient to prevent the blood flow into the anterior interosseous artery, since the latter arises from the proximal fourth of the ulnar artery The posterior interosseous artery was visualized and palpable at the wrist This vessel receives the major portion of its blood supply from the radial recurrent artery which in turn is derived from the superior profunda and anastomotica magna arteries

Conclusion

This case is one of acute arterial insufficiency of the hand resulting from thrombosis of the radial and ulnar arteries following a self-administered injection of codeine This is a hitherto unreported type of complication occurring in narcotic addicts Gangrene of the digits occurred, thereby suggesting that the radial and ulnar arteries combined may act as terminal vessels

References

1 Lowenberg E L Virginia M Monthly 67 630 (Oct.) 1940
2 Perry T T and Allen E V Proc Staff Meet. Mayo Clin. 18 19 (Jan 27) 1943
3 Anderson William Brit J Surg 7 95 (1919-1920)
4 Platt, H Arch Surg 20 314 (Feb) 1930
5 Leriche A and Stricher, P Brit. J Surg. 16 63 (Jan.) 1929
6 LeFevre, F A Am. Heart J 117 111 (Jan) 1939
7 Schör W, and Neff, G Ztschr f Chir 246 95 (Dec 10) 1935

CONTACT THERAPY FOR CANCER OF LARYNX

Total laryngectomy may not be necessary when intrinsic laryngeal carcinoma is treated by contact x-rays through a laryngeal fissure Of nine patients with large cancers, Drs Bruce Proctor, James E Lofstrom, and Carl E Nurnberger of Wayne University, Detroit, report that eight are still without visible evidence of recurrence for periods up to twenty-one months after contact therapy Following exposure of the neoplasm, as much tumor tissue is removed as possible without mutilating the entire larynx When hemostasis is satisfactory, the tube is placed directly into the larynx and a single caustic dose of 5,000 to 12,000 r is applied to the bed of the tumor Postirradiation edema is never severe Hoarseness persists but not to a serious degree — *Modern Medicine, July 1, 1948*

NECROLOGY

Alice Ross Bennett, M.D , eighty-one died at her home in Buffalo on August 9 Dr Bennett was one of the first women graduates of the University of Buffalo School of Medicine and received her medical degree in 1890 She interned a year at Women s Hospital in Detroit and then spent three years at the Michigan Women s Hospital in Swatow China. On her return to the United States she was for a time a physician in Warsaw New York. Dr Bennett had also served on the staff of Children s Hospital Buffalo *A specialist in ophthalmology* prior to her retirement in 1929, Dr Bennett was a member of the Woman s Medical Society of the State of New York, the Women s Physicians' League, and the Board of Directors of Deaconess Hospital, Buffalo

William Frederick Bender M.D., of New York City, died on August 29 at the age of seventy two He was graduated from the College of Physicians and Surgeons, Columbia University in 1913 Since 1930 Dr Bender had been a physician on the gymnasium staff of Columbia University For several years he was physician to the New York Giants and also had been physical director at the West Side Y M.C.A and the 155th Street Y M C A At one time he was on the staff of the urology clinic of St. Luke s Hospital. Dr Bender was a member of the American Medical Association and the New York State and County Medical Societies.

Bert J Bixby, M.D., of Buffalo died on September 7 at the age of seventy two after having been ill since his retirement in 1945 Dr Bixby was a graduate of the University of Buffalo School of Medicine in the class of 1903 He was consulting surgeon to Millard Fillmore Hospital Buffalo A member of the National Gastroenterological Society Dr Bender was also a member of the New York State and Erie County Medical Societies and the American Medical Association

Maurice Caspe M.D died on August 30 at his home in New York City He was ninety years of age Before his retirement ten years ago Dr Caspe practiced medicine in New York City for more than fifty years. He was graduated from Bellevue Medical School New York University in 1886 and after graduation studied bacteriology in Germany under Robert Koch and Paul Ehrlich. He was a member of the New York Academy of Medicine and the New York County Medical Society

Charles De Klyn, M.D , of New Rochelle died on September 8 at the age of sixty-six A practicing physician in New Rochelle for forty years Dr De Klyn was graduated from Columbia University College of Physicians and Surgeons in 1905 He served as a major in the Army Medical Corps during World War I and had been on the staff of the New Rochelle Hospital. He was a member of the Westchester County and New Rochelle Medical Societies

H. Leland Fifield, M.D., died on August 10 at his home in Syracuse. He was sixty-seven years of age He was graduated from New York Homeopathic School in 1906 After graduate study in Europe Dr Fifield practiced medicine in Southington Connecticut, until 1912 when he moved to Syracuse. He was superintendent of Onondaga General Hospital from 1933 to 1938. Dr Fifield for a time was on the eye ear, nose, and throat staff of Onondaga General Hospital He was a member of the Medical Society of the State of New York, the American Medical Association and the Onondaga County Medical Society

Albert A. Gartner, M.D , sixty-one died on September 9 at his home in Buffalo Nationally known as an orthopedic surgeon, Dr Gartner had practiced in Buffalo for thirty four years He was graduated from the University of Buffalo Medical School in 1914 During World War I he served in Europe with Base Hospital 23 Dr Gartner during World II *was chairman of Erie County Medical Society's* preparedness committee which passed upon the status of physicians in relation to military service.

He was assistant professor of orthopedic surgery at the University of Buffalo Medical School, chief orthopedic surgeon at the Meyer Memorial Hospital, attending orthopedist on the Millard Fillmore and Sisters Hospitals' staffs, consulting orthopedist at our Lady of Victory Hospital Lackawanna, Jones Memorial Hospital, Wellsville DeGraff Memorial Hospital, North Tonawanda, and J N Adam Memorial Hospital, Perrysburg

Dr Gartner was a former president of the board of trustees of the State Medical Society and had represented it many times as a delegate to the American Medical Association He was also a member of the American Academy of Orthopedics and a diplomate of the American Board of Orthopedics.

Henry Steers Holland, M.D , of New York City died on August 28 at the age of sixty-seven. He was graduated from the College of Physicians and Surgeons in 1905 After serving his internship at St Luke s Hospital, New York City he joined the staff of the Sloane Hospital for Women for which he was attending anesthetist for thirty years. He was a fellow of the American College of Anesthesiology and a member of the New York State and County Medical Societies.

Edwin Welles Kellogg, M.D., New York City, died on September 11 He was sixty-nine years of age. Dr Kellogg was graduated from New York Homoopathic Medical College in 1903 He was on the staff of Flower and Fifth Avenue Hospitals. A fellow of the American College of Surgeons Dr Kellogg was a member of the American Medical Association and the New York State and County Medical Societies.

Walter D Spoor, M.D , of Schenectady died on August 11 at the age of seventy-three. He was graduated from the New York Homeopathic Medical College, Denver Colorado in 1890. Dr Spoor practiced medicine in Schenectady from 1897 until his recent illness. He was a member of the American Congress of Physical Therapy the Schenectady County Medical Society the American Medical Association and the New York State Medical Society

Lon E. Stage, M.D of Bliss died on August 21 at the age of eighty two He was graduated from the University of Buffalo School of Medicine in 1893 For more than fifty five years Dr Stage had been the only practicing physician in Bliss. He was a veteran of World War I Dr Stage was on the medical staff of the Wyoming County Community Hospital He was a member of the Wyoming County Medical Society the New York State Medical Society and the American Medical Association

MEDICAL NEWS

Presbyterian Church Seeks Medical Missionaries

THE Board of National Missions of the Presbyterian Church in the United States has several positions open for doctors in hospitals and health centers The positions, which should be filled immediately, include

1 Embudo Presbyterian Hospital, Embudo, New Mexico (A 25-bed hospital for Spanish-Americans, staffed entirely by women)—an associate woman physician

2 Presbyterian Hospital, San Juan, Puerto Rico (A grade A, 135-bed hospital with accredited School of Nursing)—a resident doctor in obstetrics and gynecology

3 For the same hospital as 2—a resident doctor in internal medicine

4 For the same hospital as 2—a resident doctor in surgery

5 The Guacio Rural Social Service Center, San Sebastian, Puerto Rico (The medical dispensary is designed to serve the health needs of the entire area Hookworm, roundworm, malnutrition and tuberculosis are major problems)—a physician (volunteer service for a two year appointment—transportation, room and board provided)

Information about these vacancies may be obtained from the Board of National Missions, Presbyterian Church in the U S A, Unit of Personnel Service, 156 Fifth Avenue, New York 10, New York.

City Department of Health Announces New Position

THE New York City Department of Health announces a new type of position in the field of public health—the Public Health Assistant Provision has been made in the current budget for 22 such positions at a salary of $2,100 per annum, and an additional 50 are anticipated in the near future

Duties of Public Health Assistants will be both in the clinic and in the field They will act as receptionists, register and admit patients, make and follow up patients' appointments, transfer records from one clinic to another, pull and file records, address and send letters to patients, physicians and agencies, record laboratory and other data, keep clinic rooms in order, prepare clinic supplies and stationery, assist in preparation for and during examination of patients, perform special messenger services and other related duties

Qualifications as set up are United States citizenship, three years of residence in New York City, and high school graduation or equivalent training Applicants must be physically agile and have the following personal attributes neatness, good speech and manners, tactfulness, and willingness to accept assigned tasks For the present the positions are limited to women.

Letters of applications from those who meet the qualifications listed will be welcomed during the month of October, 1948, and should be addressed to the Bureau of Personnel, Department of Health, 125 Worth Street, New York 13, New York

To Mark Nursing's Diamond Jubilee

THE seventy-fifth anniversary of professional nursing in the United States will be celebrated nationally as Nursing Progress Week from November 12 to 20, the American Nurses Association, New York City, has announced

A diamond jubilee celebration in New York City, including a dinner on November 16, will be sponsored by President Truman, former President Herbert Hoover, Senator Arthur H Vandenberg, and a committee of public leaders The dinner will commemorate the seventy-fifth anniversary of the graduation from nursing school of the late Linda Richards, American's first professionally-trained nurse Speakers at the dinner will include Dr Arthur W Allen, who is president of the American College of Surgeons

Illinois State Medical Society Demands Young Doctors Enter Service

THE Council of the Illinois State Medical Society recently made public a resolution adopted urging all young physicians to volunteer immediately for military service The resolution, introduced by Dr Edwin S Hamilton of Kankakee, who is also a trustee of the American Medical Association, was passed unanimously by the Council, which represents practically all the 13,000 physicians of the state

The resolution is directed especially at those young doctors who received all or part of their medical education at the expense of the government, under the wartime A S T P and V-12 programs, but who did not see service in the armed forces because the war ended before they had completed their courses The resolution states that these men are still under a moral obligation to repay the nation for their expensive education, aside from their duty as citizens

American Association of Blood Banks Holds First Annual Meeting

THE first annual meeting of the American Association of Blood Banks was held in Buffalo from August 26 through August 28, with approximately 200 present representing 28 states and six foreign countries. In addition to a business session, programs of scientific and administrative papers were presented.

Officers elected for the coming year include Dr Ralph G Stillman, New York Hospital Blood Bank New York City president, Dr Thomas H Seldon, Mayo Clinic Blood Bank, Rochester, Minnesota, president-elect Dr Ernest Witebsky, Buffalo General Hospital Blood Bank, Buffalo, vice-president Miss Marjorie Saunders, Baylor University Hospital Dallas, Texas, secretary and Mr W Quinn Jordan, Phoenix, Arizona, treasurer

MEETINGS

FUTURE

New York Academy of Medicine

The twenty first Graduate Fortnight of the New York Academy of Medicine on Advances in Therapy" will be held from October 4 to 15 at the Academy, with morning panel discussions, afternoon hospital clinics, evening addresses, and scientific exhibits and demonstrations to be included in the program.

Dr Ross Golden is chairman of the Graduate Fortnight Committee, which includes Dr Mahlon Ashford, secretary, and Drs. Alfred Angrist, Lloyd F Craver, Edward H Dennen Adolph G DeSanctis, Cary Eggleston, Franklin M Hanger, Lawrence S Kubie, Madge C L. McGuinness, John H. Mulholland and Louis J Soffer

American Cancer Society

A medical symposium on the cancer problem will be held in conjunction with the annual meeting of the American Cancer Society at the Hotel Commodore New York City, November 6 and 7

The four sessions will be devoted to the cancer problem, the problem of treatment—recent advances the lung cancer problem, and the family doctor medical education and research.

PERSONALITIES

Appointed

Dr Delma Wells Caldwell, formerly of the Medical Department of the International Harvester Company and a faculty member of Northwestern University, as medical director of Standard Oil Development Company, New York City Dr Henry A. Holle, assistant chief of the division of commissioned officers of the Federal Security Agency as New York district director of the public health service. .Dr Edwin J Nugent, medical director of Rochester Products Division General Motors, as medical director of Allison Division of General Motors, Indianapolis, Indiana Dr Irwin Paul Train as assistant professor of surgery, New York Medical College and assistant attending surgeon Flower and Fifth Avenue Hospital.

Awarded

Dr William F Martin Kings County Hospital Brooklyn a scholarship to the Trudeau School for Tuberculosis at Saranac Lake, by the Brooklyn Tuberculosis and Health Association

Speakers

Dr Leo F Simpson, Rochester president of the Medical Society of the State of New York, on "The Doctor and Public Health at the Conference of Health Officers and Nurses, Saratoga Springs, July 21 The speech was printed in the August 15, 1948, issue of *Vital Speeches*

New Offices

Dr Kenneth H. Burdick, general practice in Alfred Dr Robert L. Nelson New Berlin, Navy veteran general practice in Owego Dr Robert H Wiese general practice in Delanson.

COUNTY NEWS

Dutchess County

A question-and answer program on United Medical Service was the feature of the meeting of the Dutchess County Medical Society September 8 at St. Francis Hospital, Poughkeepsie. Participating were Dr Frederick E Elliott, U.M.S director of medical service Mr John McCormack U.M.S. executive vice-president, and Mr Frank Van Dyke, A.H.S. vice-president.

Erie County

The first meeting of the Erie County Medical Society for the 1948-1949 season will be held on Tues-

day, October 26, with a clinical afternoon and evening program at the Hotel Statler, Buffalo, under the chairmanship of Dr A. H. Aaron, chairman of the program committee

Speakers will include Dr George E Slotkin, assistant professor of urology, University of Buffalo, School of Medicine, "The Results of the Treatment of Urinary Tract Tuberculosis with Streptomycin Chaulmoogra Oil," Dr Gesa de Takats, associate professor of surgery, University of Illinois, College of Medicine, "The Treatment of Cerebral Apoplexy," Dr Charles D Marple, New York Hospital, "The Use of Anticoagulants in Thromboembolic Conditions with Particular Reference to Coronary Thrombosis and Myocardial Infarction," Dr Jere W Lord, Jr, New York City, "The Surgical Treatment of Portal Hypertension," and Dr Lester R Dragstedt, chairman, Department of Surgery, University of Illinois, College of Medicine, "The Evaluation of the Results of Vagotomy"

Fulton County

Postgraduate instruction arranged by the Council Committee on Public Health and Education of the State Society was held for members of the Fulton County Medical Society on September 23 at Gloversville Dr Walter F Rogers, Jr, instructor in medicine, Syracuse University College of Medicine, spoke on "The Management of Diabetes" The instruction was provided in cooperation with the State Department of Health.

Kings County

The joint committee on postgraduate education of the Kings County Medical Society and the Long Island College of Medicine have announced a postgraduate course in "Diagnosis and Treatment of Neoplastic Disease" to be given at the Brooklyn Cancer Institute, Kings County Hospital, Brooklyn Sixteen sessions will be held for eight weeks, from 2 to 3 P M on Mondays and Thursdays, beginning October 11 Ward rounds will be Mondays through Fridays from 11 A.M to 12 NOON

Designed for physicians interested in obtaining further instruction in the diagnosis and treatment of cancer and related diseases, the course will consist of ward rounds, clinics, round table conferences, and lectures which will include the entire field of neoplastic disease X-ray diagnosis and other laboratory procedures will be discussed along with clinical manifestations, histopathologic demonstrations will be included, and methods of surgical and radiologic treatments will be outlined

Monroe County

The eighteenth season of medical broadcasts sponsored by the Monroe County Medical Society over Station WHAM, Rochester, opened on September 4 Broadcast every Saturday morning at 9 45 A.M., the programs this year will follow the theme, "Speaking of Health"

September programs included September 4—"Modern Medical Care", Rochester Hospital Service Corporation and Genesee Valley Care, Inc, September 11—"Child Safety", Dr Albert D Kaiser, Mr Edwin S Smith, September 18—Public Relations Committee, Dr Charles S Lakeman, and September 25—"Coronary Artery Disease", Dr Eli A. Leven and the Heart Committee

Onondaga County

Dr Leo M Taran, director of St Francis Sanatorium for Cardiac Children, Roslyn, will speak on "The Treatment of Rheumatic Fever" at the meeting of the Onondaga County Medical Society to be held Tuesday, October 5 at the University Club, Syracuse The program is postgraduate instruction arranged by the Council Committee on Public Health and Education with the cooperation of the State Department of Health

Wayne County

Members of the Wayne County Medical Society and its Woman's Auxiliary held a joint dinner and meeting August 10 at Sodus Bay Heights Gold Club, with Dr James Arseneau, Lyons, president, acting as chairman Principal speaker was Dr J A. Reed, Newark, who gave a talk on "Medical Practices, Past and Present"

INFANT MORTALITY

The work of the Special Committee on Infant Mortality of the Medical Society of the County of New York has been greatly hampered by lack of autopsy reports on neonatal death certificates and stillbirth certificates Since it is the function of this committee to endeavor to reduce infant mortality, it is essential that accurate pathologic diagnoses of the causes of death be available It is only in this way that an intelligent attack can be brought to the problem of reducing the incidence of stillbirth and neonatal death

In this connection the New York City Department of Health has recently pointed out that the City of Chicago is far ahead of New York in the notable record it has made in its program for the care of mothers and newborn infants, a feature of which is the intense interest of obstetricians, pediatricians, and pathologists in the cause of infant deaths and stillbirths

The New York City Department of Health has appealed to the medical profession for cooperation in making available better information

The Society's Special Committee on Infant Mortality seconds the appeal Since the greatest proportion of neonatal deaths occurs in hospitals, the autopsy problem is a comparatively simple one, if the profession at large, particularly the obstetricians and pediatricians, can be made to realize the importance of complete gross and microscopic postmortem examination in all infant deaths

This request of the Infant Mortality Committee and the Health Department would seem to be one worthy of careful consideration by the profession — *New York Medicine, July 5, 1948*

HOSPITAL NEWS

Occupational Therapy Training for Women Announced

A TEN WEEK training course for women volunteering as aids in occupational therapy divisions of hospitals will open in New York City, October 14 it was announced at the annual convention of the American Occupational Therapy Association in August.

The course is jointly sponsored by the New York State Association of Occupational Therapists and the Junior League of the City of New York and is designed for those with the leisure to permit attendance at classes three nights a week. Representatives of the United Hospital Fund the New York City Visiting Committee and the Museum of Modern Art will assist in the course, the State association said

Those completing the course will qualify as aids to professional therapists who serve on the staffs of veterans, voluntary and municipal hospitals. Registration will be held from October 5 through October 7 at the office of the Occupational Therapy Assistants Training Courses, 590 Madison Avenue, New York City

Postgraduate Course to Be Held at Brooklyn Cancer Institute

AN EIGHT-week course, consisting of sixteen sessions in the diagnosis and treatment of neoplastic disease, will be given at Brooklyn Cancer Institute, Kings County Hospital, Brooklyn, beginning October 11 Sponsored by the Joint Committee on Post-Graduate Education of the Medical Society of the County of Kings and the Long Island College of Medicine the courses will be given by Dr William E. Howes and the staff of the Institute.

They will be held from 2 to 3 P.M. on Monday and Thursday afternoons, with ward rounds Mondays through Thursdays from 11 00 o clock to 12 noon.

This course is designed for physicians interested in obtaining further instruction in the diagnosis and treatment of cancer and related diseases. It will consist of ward rounds, clinics, round table conferences, and lectures which will include the entire field of neoplastic disease. X-ray diagnosis and other laboratory procedures will be discussed along with clinical manifestations Histopathologic demonstrations will be included Methods of surgical and radiologic treatments will be outlined.

Veteran physicians may apply under the G I Bill, but must present a Certificate of Eligibility Veterans who have previously submitted Certificates to the Committee do not need a new one to re-enter training, provided they have not taken courses elsewhere since filing the Certificate with the Committee. A supplemental Certificate is required only if the veteran has interrupted his training by taking postgraduate courses elsewhere

To make application or to obtain further information call STerling 3-6900 or address The Registrar Joint Committee on Post-Graduate Education, Medical Society of the County of Kings 1313 Bedford Avenue, Brooklyn 16, New York.

Blue Cross to Pay Extra $2,500,000 to New York Hospitals

TO HELP New York hospitals solve the problem of inflationary costs, Associated Hospital Service—New York's Blue Cross Plan—has adopted a new formula which calls for at least $2,500 000 in extra payments to its 200 participating hospitals during the next year, it was announced recently by Louis H. Pink president. The formula provides for payments to be revised periodically on a quarterly basis in an upward or downward direction depending on living costs. Since prices are rising, the total paid to hospitals at the end of the year may exceed the amount anticipated at this time, Mr Pink explained.

AHS payments to hospitals for 1948 including the cost-of living supplementary payments, are estimated at more than $32,000 000

The new formula, which went into effect on behalf of all Blue Cross members admitted to hospitals on and after September 1, has been approved by the State of New York Insurance Department and endorsed by the United Hospital Fund, the Greater New York Hospital Association, a special committee of hospital presidents and trustees and the Hospital Advisory and Public Advisory Committees of Associated Hospital Service

Courses Offered for General Practitioners and Psychiatrists

THE New York Medical College Flower and Fifth Avenue Hospitals has announced the following courses for general practitioners and psychiatrists:

'Readings in Psychoanalytic Literature (Second Part) consisting of fifteen sessions and beginning on October 5 1948, will be held on alternate Tuesday evenings at 8 30 P.M. A Seminar in Psychosomatic Medicine will begin on October 6 and will be held for twelve sessions on Wednesdays at 8 30 P.M. 'Introduction to Psychoanalysis, consisting of ten lectures, will begin on October 11 to be held on Mondays at 8 30 P.M A course in 'Psychiatry and Psychoanalysis will begin on February 9 1949 and will last for fifteen sessions, being held on Wednesday evenings at 8 30 P.M.

Application should be made through the Office of the Dean New York Medical College, Flower and Fifth Avenue Hospitals 1249 Fifth Avenue, New York City 29

Fees for the first three courses are $40 for each course. Fee for 'Psychiatry and Psychoanalysis' is $30

Brooklyn Jewish Hospital Agrees to Train Unit for Army

THE United States Army Medical Department and Jewish Hospital, Brooklyn, signed an agreement in August under which the hospital will organize a medical unit trained for instant use by the Army in case of any national emergency

Colonel Roosevelt Cafarelli, of the Army Medical Department, representing Major General Raymond W Bliss, Surgeon General of the Army, said that four other New York hospitals had agreed to organize similar mobile units These are Queens General Hospital, Presbyterian Hospital, Mount Sinai, and the Kings County Hospital, he said

In Washington, Army representatives said that such units are being organized in hospitals throughout the United States as part of the nation's reserve mobilization program They will be expected, it was said, to meet any emergency which may arise

In the agreement the Jewish Hospital plans to hold quarterly training periods for personnel participating in the program, and to make available at no expense to the government adequate space for classroom facilities and for storing equipment

While the Army will not direct the unit, it will, Colonel Cafarelli said, lend its medical experts to address classes on technical subjects and will advise on the training programs Emphasis will be placed on coordination as a unit, and the rules, regulations, and practices of the Medical Corps, so that the group might shift smoothly to Army direction should any national emergency develop

Admission Rates for Public Mental Hospitals Increase

THE "first admission" rate to public mental hospitals during 1946 was 88 4 per 100,000 of the population for the country as a whole, and for the same year the hospitalization rate was 372 2, according to figures of the Mental Hygiene Division of the Public Health Service

These rates showed considerable variation from state to state The "first admission" rate ranged from a high of 146 3 in New Hampshire to a low of 58 1 in Indiana, and the corresponding range for the hospitalization rate was from 593 9 in New York to 206 1 in Utah Although this variation may reflect to some degree differences in the extent of mental illness from state to state, it is much more likely that it represents differences in the extent of the facilities available for the care of the mentally ill, the rate of turnover in hospitals of the type under consideration, and other administrative factors

The figures are based on the results of the 1946 Census of Patients in Mental Institutions, collected and tabulated by the Bureau of the Census, Department of Commerce Collection of these data was made a function of the Mental Hygiene Division, Public Health Service in February of this year in view of the Service's increased responsibilities under the National Mental Health Act.

Since patients in private mental hospitals are not necessarily hospitalized in the states in which they reside, the rates are based on statistics for public hospitals only The statistics on veterans hospitals are adjusted figures based on tabulations prepared by the Division of Medical Research Statistics

NEWS NOTES

At the July 12 meeting of the staff of St Francis Hospital, Poughkeepsie, Dr J J Toomey presented a case report on intraperitoneal cyst of presumably traumatic origin. The discussion was by Dr M M Simon At the August 9 meeting Dr Louis Ferraro presented kodachrome studies of specimens

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Dr Claude E Forkner, New York City, presented a discussion on "The Diagnosis and Treatment of Leukemia" at the June 23 meeting of the Sharon Hospital staff, Sharon, Connecticut

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Plans are underway for the building of a new wing to Wyckoff Heights Hospital, Brooklyn, which will add 100 beds to the present capacity of the hospital. This will increase the hospital's capacity one-third, making a total of 300 beds and bassinets

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A week-long series of conferences was sponsored in August by the Council of Rochester Regional Hospitals About 100 persons, representing hospital staffs of 11 counties, attended the conference Miss Esther N Thompson, council nursing associate, was in charge of the program, and the meetings were held in the Catherine Strong Hall of the University of Rochester

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Completion of several remodeling projects for St Luke's Hospital, Utica, has been announced by Carl P Wright, Jr , director of the hospital. The work, in the process of planning and construction for several months, is part of a general renovation program

An extensive remodeling of the maternity floor—including enlargement of both delivery and nursery facilities—and creation of a private admissions office for incoming patients were cited especially as alterations designed to improve patient comfort Another change—the setting up of a central sterile supply room for the entire hospital—was considered essential by the State Board of Nurse Examiners in connection with the approval of St Luke's Nurse Training School.

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The Olean Medical Group, the first group practice medical center in the Buffalo area, was opened in August The medical staff comprises Dr William C Goodlett, Dr Norman P Johnson, Dr A. L

Runals, Dr Wilber J Manley, and Dr Fred W Kehr Upon call will be Dr Leslie J Atkins, consulting urologist, Dr Leo D Moes, consulting pathologist and Dr Murray Reswick, consulting roentgenologist.

The expansion of Albany Hospital is being planned, according to an announcement from the hospital. The new bed section of the addition would provide 37 beds for neurosurgery, 38 for thoracic and plastic surgery, 26 for pediatric cases, and 20 admitting unit beds for overnight patients.

The hospital at present has a capacity of 541 beds and 30 bassinets, but is overcrowded with 60 additional beds and 18 bassinets set up

The new addition also would provide lecture rooms and laboratories for the expanding school of nursing The new outpatient department would provide a diagnostic clinic and mental hygiene clinic. The present outpatient department would be used for locker and rest rooms, the medical records department, and housing for staff members.

PERSONALITIES

Appointments

Dr Jesse Donald Stark, director of radiology, Gouverneur Hospital, New York City as expert Civilian Consultant to the Surgeon General in the occupied European zone. Dr Stark will devote a month to visiting, with three other appointees, the United States hospitals in Germany and Austria to promote and further improve the quality of medical instructional facilities in the field of radiology As coordinator at the Staten Island Hospital, Dr John S Snider who will guide the interns in their courses of instruction as facilitated by the New York Committee for the Study of Internships and Residencies.

Dr Herman B Snow, supervising psychiatrist of Binghamton State Hospital, as assistant director of Utica State Hospital As chief surgeon of the A. Barton Hepburn Hospital Ogdensburg, Dr John L. Free succeeding the late Dr G C Madill To the medical board of St. Vincent s Hospital Staten Island, Dr Mather Cleveland, consultant in orthopedics, Dr Thomas Mulcahy, to the attending staff in urology, and Dr Joseph Hulnick adjunct in gynecology

Dr Joseph Levi, formerly chief clinical psychologist, Veterans Administration Hospital Bronx, as research psychologist, Institute of Rehabilitation New York University Bellevue Medical Center

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WARN EX-SYPHILITIC VETS

A warning is being issued to veterans who were treated in service for syphilis with penicillin that they need periodic checkups because there is a possibility that between 20 and 30 per cent of these cases were failures officials of the Veterans Administration stated.

The old Army treatment for the disease with arsenic and bismuth was time-tested, and results were therefore predictable. The disadvantage in this twenty-six-week treatment was that one out of every 30 000 was killed, while penicillin has proved superior without killing any patients. However, penicillin treatment is still in an early stage. It will require about twenty years study and follow-up to determine the effect on the patient.

Meanwhile, Uncle Sam is worried about the boys who received treatment and thought themselves cured, because in many cases the patient received either inadequate treatment, because of discharge did not get the necessary blood and spinal fluid tests required for a year after treatment, or was discharged before he got an examination of his spinal fluid.

Syphilis, if not treated or inadequately treated, *may attack the heart and nervous system and therefore* in many cases leads to insanity Officials estimate that each case of insanity in a veteran costs the taxpayer $40 000 from the time the patient is admitted to a hospital until his discharge.

They estimate that approximately 400 000 veterans were treated while in service in the armed forces. About 52 000 veterans were treated in 1946 following their discharge but there is no way of telling what proportion were infected after they got out and which of them were relapse cases No one has followed Army cases long enough

The officials of the Veterans Administration cautioned that without preventive action now, syphilis in veterans will cost the taxpayer around one billion dollars in the course of the next twenty-five years.—*Science News Letter August 7, 1948*

FORTY-SECOND ANNUAL MEETINGS

of the

DISTRICT BRANCHES

of the

MEDICAL SOCIETY OF THE STATE OF NEW YORK

PROGRAMS

Second District Branch

Wednesday, October 20, 1948
Garden City Hotel
Garden City, New York

Morning Session

10 30 A.M —Symposium on Rheumatic Fever

"Rheumatic Heart Disease in Children"
Leo M Taran, M D , medical and research director, St Francis Sanatorium for Cardiac Children, Roslyn

"Experimental Viral Carditis" (with lantern slide illustrations)
John M Pearce, M D , professor of pathology, Cornell University Medical College

"The Diagnosis and Treatment of Rheumatic Fever"
William Dock, M D , professor of medicine, Long Island College of Medicine, director of medicine, College Division, Kings County Hospital

Business Meeting, Election of Officers

12 30 P M —Luncheon

Remarks by Mrs Edgar M Neptune, president, Woman's Auxiliary to the Medical Society of the State of New York

Address by John J Masterson, M D , Brooklyn, president-elect, Medical Society of the State of New York

Afternoon Session

2 30 P M —"Newer Concepts of the Autonomic Nervous System"

L Corsan Reid, M D , associate professor of physiology, New York University, College of Medicine

The Woman's Auxiliaries of the four county medical societies on Long Island will attend the luncheon and will hold a meeting at the Garden City Hotel in connection with the meeting of the Second District Branch (Notice of this meeting will be mailed to the members of each of these auxiliaries) Bridge will follow

Officers—Second District Branch

President	John B D Albora, M.D Brooklyn
First Vice-President	Charles C Murphy M D Amityville
Second Vice-President	Thomas M D Angelo M D Jackson Heights
Secretary Treasurer	Charles F McCarty M D, Brooklyn

Presidents of Component County Societies

Kings	A W Martin Marino M D Brooklyn
Nassau	Harold A Butman M D Manhasset
Queens	Alfred Angrist, M D, Jamaica
Suffolk	Wilbur S Stakes M D Patchogue

First District Branch

Tuesday, October 26 1948
St. Luke's Hospital
Newburgh New York

Morning Session

Golf at the Powelton Club

Afternoon Session (St. Luke's Hospital)

2 00 P.M.—'Cancer and the General Practitioner' John C A. Gerster M.D New York City assistant professor of clinical surgery, Cornell University Medical College clinical professor of surgery, New York University College of Medicine

'Trends in Diagnosis and Treatment of Cancer of the Uterus

Howard C Taylor Jr, M D, New York City professor of obstetrics and gynecology, Columbia University College of Physicians and Surgeons

Business Meeting, Election of Officers

Evening Session (Powelton Club)

6 30 P.M.—Dinner

Introduction of officers of the Medical Society of the State of New York

Address by John J Masterson M D Brooklyn president-elect

Remarks by Mrs. Edgar M. Neptune president, Woman's Auxiliary to the Medical Society of the State of New York

'Medical Economics' James R. Miller M.D., Hartford, Connecticut trustee, American Medical Association

Ladies will join the members of the District Branch for dinner

Officers—First District Branch

President	Harold F Morrison, M.D Tuxedo Park
First Vice-President	Stephen R Monteith, M.D Nyack
Second Vice-President	Wm. Crawford White M.D, New York City
Secretary	I J Landsman M.D Bronx
Treasurer	Henry W Miller M.D Brewster

Presidents of Component County Societies

Bronx	R. J Azzari, M.D Bronx
Dutchess	Louis W Stoller M.D., Poughkeepsie
New York	William B Rawls, M.D New York City
Orange	Theodore R. Proper M D., Newburgh
Putnam	Robert S. Cleaver M.D Brewster
Richmond	Joseph H. Diamond, M D New Brighton
Rockland	George G Stone M.D Suffern
Westchester	William G Childress, M.D Valhalla

ABSTRACT OF MINUTES OF THE COUNCIL OF THE MEDICAL SOCIETY OF THE STATE OF NEW YORK

At its meeting on June 10, 1948, the Council considered the following matters, taking action as indicated

Secretary's Report

Remission of State Assessments—Remission of State assessments was voted on account of service with the armed forces for one member for 1948 and three for 1947, also on account of illness for Edward M Wells of Rensselaer County for 1947 and 1948

Your Secretary has endeavored to make a commencement of the work set out for him by your recent House of Delegates Matters referred to the Council are being routed to you as fast as possible

On June 1, your Secretary conferred with Mr Arthur F Duffy, New York State Commander of the American Legion, at his office in Jamaica, Long Island, regarding Veterans Medical Service Plan of New York, Inc

In accordance with a communication received from Dr Joseph S Lawrence, director of the Washington Bureau of the American Medical Association, letters were sent to each county medical society president and legislative committee chairman, each Woman's Auxiliary county chairman and executive committee chairman requesting that they write to their representatives in Washington urging opposition to Section 4(C) of H R 6401 which calls for drafting members of our profession up to the age of forty-five years Mr Thomas E Walsh of the Public Relations Bureau was most helpful in quickly accomplishing Dr Lawrence's desires

In accordance with the spirit of a resolution passed at your last meeting, a letter was written to Senator Ives urging that the 1948 Republican Party Platform contain a plank opposing socialized medicine and endorsing the American spirit of free enterprise in professions and business I have also talked to Miss Jane Todd on this subject, and expect to contact Miss Mary Donlon, who is a member of the Platform Committee

Last Thursday morning was spent in conference with Dr Herbert Bauckus, president of Veterans Medical Service Plan of New York, Inc , Dr Harding and Dr Kleinman of the U S Veterans Administration Most of the afternoon was allotted to the Annual Meeting of Veterans Medical Service Plan of New York, Inc

Representatives of the Medical Societies of the Middle Atlantic States concerning National Emergency Preparedness met on Tuesday, June 8, in Philadelphia There were 18 gentlemen present, (including Dr Chas Gordon Heyd and myself) representing New York, New Jersey, Pennsylvania, Maryland, the District of Columbia, and Virginia Delaware was not represented Dr Colby Engel conducted the meeting in a fine way

The consensus of opinion was that this was an exploratory meeting They decided they would hold themselves in readiness for a future meeting at the call of the chairman Dr Engel was elected chairman Dr Fetter, also of Philadelphia, was elected vice-chairman, and Mr Irwin, the executive secretary of the Philadelphia County Medical Society, was elected secretary

It was felt that in case of an atom bomb the matter to be prepared for beforehand divided itself into three spheres (1) public health services, (2) administrative services, and (3) medical care services

Communications—1 Letter from Dr Thomas M D'Angelo, chairman of the Malpractice Insurance and Defense Board, dated May 20, 1948, re work of Mr Joseph Linder in connection with the Malpractice Insurance and Defense audit and report

It was voted that the Secretary be instructed to write a letter to Mr Joseph Linder expressing appreciation for his work in connection with the audit of the account of the Malpractice Insurance and Defense Board and for his appearance at the House of Delegates

2 Letter from John A Kenny, editor, National Medical Association, Inc , 39 Madison Avenue, Montclair, New Jersey, requesting permission to publish in the *Journal of the National Medical Association* the resolution regarding acceptance for membership of doctors in county medical societies irrespective of race, color, or creed

It was voted that the Secretary reply stating that this organization has a perfect right to quote anything that has come through the press

3 Letter from Dr Ap Pyrghialis, president, and Dr Alex Valsamakis, secretary, Medical Association of Magnesia, C Glavani Street No 10, Volos, Greece, under date of March 26, 1948, requesting that we, "as a free democratic people of the world, raise a voice of protest to the other civilized people in the world, in order to cease these crimes of the bandits against the young children of Greece"

It was voted that this letter be referred to the American Medical Association with a request that if they do not care to answer it, they advise us how we should

4 Letter from Dr Foster Murray, dated May 25, 1948, giving list of officers elected for the new Section on Chest Diseases and requesting confirmation thereof

It was voted that the officers selected by the new Section on Chest Diseases be confirmed

5 Letter from Dr Louis H. Bauer, secretary-general of the World Medical Association, under date of June 2, 1948, as follows

Dear Dr Anderton

The Council of the World Medical Association has asked me to express to you their appreciation of the courtesies of the association in tendering them a dinner on the evening of April 28 at the Hotel Biltmore

The Council was also most enthusiastic about all the courtesies shown to them while they were here.

6 Letter from Senator Irving M Ives, under date of June 5, 1948, as follows

Dear Dr Anderton

Your letter of May 27 has been received and I have noted the recommendation you make with regard to the 1948 Republican Platform. You may be sure that I shall be most opposed to any plank favoring socialized medicine

The very kind thought regarding myself which you express is greatly appreciated.

With kindest personal regards I remain

7 Letter from Dr John C McClintock, secretary of the Committee on Thyroid Cancer of the American Association for the Study of Goiter, under date of May 24, 1948, expressing appreciation for kindness extended to him and the excellent manner in which the Annual Meeting of the State Society was conducted

Treasurer's Report was Accepted.

Report of Executive Officer

Dr Hannon reported he had been busy making arrangements for the fall meetings in the district branches He stated he had attended a meeting called by the Department of Education with a group from New Jersey represented by the ex-governor, Mr Moore, the president-elect, and past president of the New Jersey State Medical Society and two members of the exchange board for the purpose of considering reciprocity and endorsement of licenses between New Jersey and New York. Senator Hammer and Dr J Stanley Kenney of our Council were also present. The New York endorsement of New Jersey licenses was stopped in 1940, and New Jersey refuses to endorse a New York license.

After a lengthy discussion it appeared that the New Jersey Board of Medical Examiners has raised its standards sufficiently for the Department of Education and the Committee on Endorsement of License to consider endorsing New Jersey licenses issued after 1947 and with that it would appear that New Jersey would then consider endorsing New York State licenses.

Activities of Committees

Legislation.—Dr Aranow chairman, stated that next year he thought the different groups that wished legislation introduced should get together and agree on just what they wanted so that his committee would not be embarrassed by disagreements among the various groups.

Constitution and Bylaws.—Dr Reuling chairman reported as follows

There is one item received from New York County accompanied by a long letter which I will not read They have adopted a change in Bylaws relative to malpractice amending Article 2 of Chapter VIII of the Bylaws by adding at its end a new sentence to read as follows

Rulings of the Censors and of the Comitia Minora in any matter properly before them shall be binding upon the members involved therein unless and until such rulings shall be modified, revised or reversed upon appeal or by a court of competent jurisdiction and interpretations of the Principles of Professional Conduct of the Medical Society of the State of New York and of the By laws of this Society (including appendices) made by the Censors or by the Comitia Minora other wise than in the course of a matter before them shall be binding generally upon the members upon approval thereof by a majority vote of the members present at any annual or stated meeting of the Society noticed for that purpose

The counsel of the Society sees no objections, and I think the majority of the committee also find no objection to it. I move its approval.

It was voted that this change be approved

Convention.—Dr Wertz, chairman reported that there were two dates open at the Hotel Statler in Buffalo the weeks commencing May 2 and May 23 for the 1949 Annual Meeting of the Society He thought the Committee should consider these dates and where the Meeting should be held in Buffalo

After discussion, *It was voted* that the date and place of meeting in Buffalo be left to the Convention Committee.

Economics.—Mr Farrell director of the Bureau of Medical Care Insurance made the following report

TABLE 1.—MEMBERSHIP PROGRESS—ACCORDING TO TYPES OF CONTRACT—QUARTER ENDING MARCH 31 1948

Types of Contract	United Medical Service, Inc. New York	Western New York Medical Plan, Inc. Buffalo	Medical and Surgical Care, Inc. Utica	Central New York Medical Plan, Inc. Syracuse	Genesee Valley Medical Care Plan, Rochester	Northeastern New York Medical Service, Inc. Albany	Totals
Surgical only							
Mar 31 1948	639 145	106,152		2,346	50 962		798 605
Dec. 31 1947	576 924	96,379		1 950	46,145		721 398
Increase	62,221*	9 773		396	4,817		77,207
Surgical-in-hospital medical							
Mar 31 1948	158,539	22,627				30,017	211,183
Dec. 31 1947	122 060	23,329				22,778	168,167
Increase	36,4 9	−702				7,239	43,016
Surgical-medical home, office hospital							
Mar 31 1948	34 729			13,580			48,309
Dec. 31 1947	25 740			13,372			39 112
Increase	8,989			208			9 197
Surgical—special benefits, plan III							
Mar 31, 1948			17 287				17,287
Dec. 31 1947			18,529				18,529
Increase			−1,242				−1,242
Surgical—special benefits plan IV							
Mar 31 1948			77,096				77 096
Dec. 31 1947			70,840				70,840
Increase			6,256				6,256
Medical expense fund and ward							
Mar 31 1948	709						709
Dec. 31 1947	833						833
Increase	−124						−124
Grand totals (Mar 31 1948)							
Membership	833 122	128,779	94,383	15 926	50 962	30 017	1 153,189
Increase	107,565	9,071	5,014	604	4,817	7,239	134,310

* 4,730 In-hospital surgical members transferred to surgical contract and included in increase of 62,221.

TABLE 2 —MEMBERSHIP PROGRESS—ACCORDING TO CLASS OF PARTICIPANTS—QUARTER ENDING MARCH 31, 1948

Class of Participants	United Medical Service Inc New York	Western New York Medical Plan Inc. Buffalo	Medical and Surgical Care Inc., Utica	Central New York Medical Plan, Inc., Syracuse	Genesee Valley Medical Care Plan Rochester	Northeastern New York Medical Service Inc , Albany	Totals
Subscribers	427 923	50 581	46 199	6,744	21 565	13 028	566 040
Dependents	405 199	78 198	48 184	9,182	29 397	16 989	587 149
Totals	833 122	128 779	94 383	15 926	50,962	30 017	1 153 189

March 16, 1948 Your Director appeared before the Woman's Auxiliary of the Richmond County Medical Society at St Vincent's Hospital, Staten Island, and spoke on medical care insurance

April 7, 1948 He spoke before the Orleans County Medical Society at the Orleans Hotel, Albion, to discuss problems relative to payment for services rendered to Farm Security Administration patients under a special contract offered by the Western New York Medical Plan

April 8, 1948 Mr Farrell spoke at a regular meeting of the Medical Society of the County of Steuben at the Baron Steuben Hotel, Corning The Woman's Auxiliary to the Medical Society of the County of Steuben and the County Dental Society members also attended Mr Farrell's topic was "Voluntary Health Insurance From the Viewpoint of the State Medical Society"

May 11, 1948 Your director spoke before the Medical Society of the County of Columbia at a regular meeting at Valatie on the subject of medical care insurance

May 13, 1948 Mr Farrell attended the semi-annual meeting of the Middle Atlantic States Regional Conference on Medical Service at Philadelphia He also attended a meeting of the Committee on Liaison with Veterans Administration at the Hotel Pennsylvania, *May 16, 1948*

May 21, 1948 Dr A. H. Aaron and your director attended a joint meeting of District II and III, as proposed by Associated Medical Care Plans, called by Dr Frederic E Elliott, temporary chairman, and held in the United Medical Service offices

Dr Elliott reported that Dr Carlton E Wertz of Buffalo and Dr Norman M Scott of Newark were elected as Commission members to Associated Medical Care Plans from District III, and Dr Frederic E Elliott and Mr John F McCormack were elected as Commission members from District II, to become effective at the next annual meeting of AMCP

Attached is progress report on the six voluntary nonprofit medical care plans for the quarter ending March 31, 1948 (Tables 1–5)

TABLE 3 —MEDICAL CALL RIDER (OPTIONAL BUT ISSUED AS SUPPLEMENTAL COVERAGE TO PLANS III AND IV)

Plan III and IV—Low Cost	
March 31, 1948	34,297
December 31 1947	28 834
Increase	5 463
Plan IV—High Cost	
March 31 1948	3,113
December 31 1947	3,169
Increase	−56
Grand Total Increase	5 407

TABLE 4 —FINANCIAL PROGRESS—QUARTER ENDING MARCH 31 1948

Plan Location	Earned Premium Income	Claims Incurred	Expenses Incurred	Reserve Deferred Maternity Benefits	Liabilities and Reserves for Unpaid Surgical and Medical Claims	Statutory Reserve	Unassigned Surplus	Net Surplus
New York								
Mar 31	$1,386 145	$794 397	$285,037	$840 000	$450 000	$367 555	$859 156	$1,226 711
Dec. 31				800,000	440 000	305 880	641 928	947,808
Increase				$ 40 000	$ 10 000	$ 61 675	$217 228	$ 278 903
Buffalo								
Mar 31	$ 223,612	$151 851	$ 24 590	$ 77,240	$ 99,535	$116 077	$ 90 423	$ 206 500
Dec. 31				71 480	86 462	106 678	57 116	163,794
Increase				$ 5 760	$ 13 073	$ 9 399	$ 33 307	$ 42 706
Utica								
Mar 31	$ 186 714	$147 198	$ 26 834	$ 92 283	$164,324	$ 85 519	$159 681	$ 245 200
Dec. 31				92 283	145 582	78,060	151 557	229 617
Increase					$ 18 742	$ 7,459	$ 8 124	$ 15 583
Syracuse								
Mar 31	$ 42 981	$ 32 145	$ 5 723	$ 4 209	$ 27 578	$ 11 880	$ 39 661	$ 51 541
Dec 31				4 209	26 873	10 161	35 317	45 478
Increase					$ 705	$ 1,719	$ 4 344	$ 6 063
Rochester								
Mar 31	$ 77,889	$ 45 762	$ 9,774	$ 32 062	$ 49 546	$ 13 357	$ 57,779	$ 71 136
Dec. 31				29 873	29,165	10 015	46 316	56 331
Increase				$ 2,189	$ 20 381	$ 3 342	$ 11,463	$ 14 805
Albany								
Mar 31	$ 56 669	$ 41 698	$ 6 206	$ 3,750	$ 33 656	$ 6,109	$ 18 922	$ 25 031
Dec. 31					16 300	3 842	16 174	20,016
Increase				$ 3,750	$ 17 356	$ 2,267	$ 2,748	$ 5 015

Note Earned premium income and claims and expenses incurred are determined from the beginning of each year therefore no increases can be shown until the end of the second quarter of 1948.

TABLE 5.—Claim Data—Quarter Ending March 31 1948

Plan Location and Types of Contracts	Number of Claims	Amount	Ratio to Earned Premium (Per Cent)	Average Cost per Claim	Claim Incidence per 1 000 Participants per Annum	Average Exposure Participants
New York*						
Surgical Expense Indemnity	9 038	$387 739	62 06	$65 02	58 0	612 795
Surgical—In-Hospital Medical	2,288	133,858	44 80	58 50	65 1	140,539
General Medical	4,853	61 965	47 98	12 76	641 0	30,280
Buffalo*						
Surgical	2 983	$ 90,243	62 72	$32 24	117 9	101 197
Surgical—In-Hospital Medical	1 938	42,705	60 84	22 03	338 3	22,910
Utica						
Plan III Surgical and Special Benefits	887	$ 24,954	55 81	$28 13	198 1	17,908
Plan IV, Surgical and Special Benefits	3,968	123,343	86 08	30 80	214 5	73 968
Syracuse						
Surgical	109	$ 3 045	78 94	$27 94	202 9	2 148
Surgical and Medical	2 036	29 099	74 87	11 03	782 4	13 476
Rochester						
Surgical Expense Indemnity	1 197	$ 45 62	58 75	$38 23	08 9	46,407
Albany						
Surgical—In-Hospital Medical	890	$ 41,698	73 58	$46 85	134 8	26 400

* Paid basis; all others on incurred basis.
Note: Experience of Medical and Surgical Care Inc. Utica, includes benefits under medical call rider

Total membership at March 31 1948 was 1 153 - 189 an increase during the quarter of 129 574 which exceeded by 12 070 the increase for the correspond ing period in 1947

Incurred benefits to members was $1,208,051, as compared to $792,244 for the same period in 1947 representing an increase of $415 807 or 52 per cent.

Finance.—Dr Andresen, chairman, submitted the revised budget for the last six months of the year ending December 31, 1948 This was approved and referred to the Board of Trustees.

Medical Licensure.—Dr Strohm, chairman, reported verbally

"I just received yesterday a letter from the Medical Society of the County of New York in which they make some recommendations to the Council concerning qualifications for applicants for licensure in New York State Some of them are in effect. One or two of them have been tried again and again I would beg your indulgence to give a more complete report on this at our next Council meeting because I have really not had time to look the thing over carefully but I think it was pretty well covered in the Annual Report of the Committee on Medical Licensure.

Office Administration and Policies.—Dr Ander ton reported for Dr Masterson, the chairman, that the committee had met on June 9 and routine business was transacted It had no recommenda tions to make to the Council

Public Health and Education.—The report as distributed with the Agenda is as follows

Activities of the Chairman.

June 3 1948 In Syracuse attended the Semi-Annual meeting of the Board of Directors of the American Cancer Society New York State Division

June 4 1948 In Syracuse attended a meeting of the Executive Committee of the Fifth District Branch.

June 9, 1948 In New York City a meeting of the Council Committee on Public Health and Education and the Subcommittee on Cancer was held with representatives of the New York State Department of Health Some of the officers of the Medical Society of the State of New York were also present at this conference

Subcommittee on Hard of Hearing and the Deaf.—The following report was submitted by Gordon D Hoople, M D chairman

"On May 17 1948 in New York City, the chair man of the Subcommittee on Hard of Hearing and the Deaf conferred with Dr Morton L. Levin, Dr Leon Sternfeld, and Dr I Jay Brightman of the State Department of Health There is the possibility of allocation of some State and national funds for the work of the program of conservation of hear ing in New York State. Considerable progress was made at this meeting These individuals were in formed of some of the needs of the program and were instructed how from the otologists standpoint they should be met. Your chairman was informed by them of some of the difficulties and after con-ference ways of eliminating blocks were discussed They felt confident that some measures of worth, from a financial standpoint could be brought about.

Postgraduate Instruction.—Postgraduate instruc-tion has been completed in the following counties Allegany Chemung Clinton, Genesee, Madison Nassau Oneida, Ontario Oswego, Queens, St. Lawrence Saratoga, Seneca, Suffolk, Sullivan Tioga, Ulster and Westchester

Arrangements have been completed for a sym posium to be presented at a joint meeting of the Rockland County Medical Society and the Rockland County Dental Society on June 16 1948 in Pomona.

Postgraduate instruction will be given in the near future in Chenango and Otsego Counties

A request has been received from the Sullivan County Medical Society for instruction to be pre-sented in the fall

We hope to have the 1948–1949 Course Outline Book ready for mailing as soon as possible. The material is being compiled and will be sent to the printer within a short time.

Subcommittee on Cancer.—Dr Anderton sub-mitted the following report of a meeting held on June 9 1948 for Dr Post chairman of the Subcommittee on Cancer

There were ten gentlemen present, representing the Medical Society of the State of New York, the Cancer Society and the New York State Depart-ment of Health The meeting considered and ap-proved a program of cancer control of the Bureau of Cancer Control of the New York State Depart-

ment of Health That is a splendid and inclusive report It is fair to explain that it reaches into the realm of idealism in certain of its parts, and it was arranged with that intention at the start

"Second, there was referred by this Subcommittee on Cancer to a subcommittee composed of Dr Aide and Dr Gerhart the formulation of a blueprint for detection clinics, that is the idea was that they will bring to the committee next time a plan for the setting up of a cancer detection clinic

"Also they will bring in a report or statement of qualifications for fellowships in the study of cancer The State Department of Health allots certain sums to men in order to take postgraduate study in the subject of cancer, and this Subcommittee will bring in recommendations which will be sent to the Health Department from this body eventually regarding qualifications that men should have in order to receive those fellowships from the State Department of Health

"Also referred to this Subcommittee was the subject of recommendations for a plan for tumor clinics"

Planning Committee for Medical Policies—Dr Kenney stated that the House of Delegates had continued this special committee of the House of Delegates and reminded the Speaker that it was his prerogative to appoint six members

Committee on Public Relations—Dr Winslow, chairman, presented the following report

"Considerable success was achieved by the Public Relations Bureau in reaching the public through publicity emanating from the 142nd Annual Meeting Clippings are being received almost daily from newspapers throughout the State, indicating an unusually wide coverage of the meeting by the press During the meeting, the press room set up by the Public Relations Bureau was a center of activity for approximately 20 representatives of newspapers, wire services, and periodicals Daily coverage was provided by the leading New York newspapers and wire services On two occasions stories in the *New York Times* were played up on the first page, and both the *Times* and the *Herald Tribune* devoted editorials to certain actions taken by the House of Delegates The Public Relations Bureau sent four special mailings to the city and State press during the course of the meeting and also arranged for the distribution of photographs of the incoming and retiring officers of the Society and of the Woman's Auxiliary

"In response to a mailing of approximately 2,500 copies of *20,000 Years of Service*, the commemorative booklet honoring those physicians in New York State who have practiced medicine fifty years or more, a large number of laudatory and appreciative letters have been received Thirty-six personal letters from the fifty-year men expressing their pleasure in having been included in the booklet were among this number, and there were 97 others from other state societies, officials of the American Medical Association, librarians, and friends of the Society A sampling of the comment contained in these letters indicates the success which the booklet achieved in fulfilling its purpose Some of these comments are

'Thanks very much for the copy of *20,000 Years of Service* I feel too highly complimented'—Dr Nathan B Van Etten, Past-President of the American Medical Association

'This certainly took a lot of work but the final result was worth the effort.'—Dr George F Lull, Secretary and General Manager of the American Medical Association

'I will treasure it always'

'It was a splendid thought and beautifully developed'

'These lines are to express my heartfelt gratitude for putting my name and likeness in such illustrious company'

'The booklet accomplishes its purpose admirably'

'We old-timers are made very happy that we should have been so handsomely remembered by our State Society'

'Thank you for the lovely thing you have done'

'It was a very gracious gesture on the part of our Society to bestow this honor on us in recognition of fifty or more years of service—an honor I shall cherish the rest of my life'

"Certificates have been mailed to 130 member physicians who reached the fifty-year mark during the past year

"A News Letter was mailed on May 5 calling attention to the Teaching Day program during the Annual Meeting and describing the steps being taken by certain county societies to provide round-the-clock medical service in cases of emergency A bulletin of the Investors League, Inc, expressing opposition to the Wagner-Murray-Dingell Bill, was attached to the News Letter

"During the course of the month a newspaper release based on an editorial in the NEW YORK STATE JOURNAL OF MEDICINE on the use of penicillin as a prophylactic in the eyes of newborn children was sent to New York State dailies and the JOURNAL exchange list

"The following postgraduate sessions, held under the auspices of the Committee on Public Health and Education, were covered by releases to the press Clinton, Fulton, Genesee, Jefferson, Madison, Rockland, and Sullivan

"The Public Relations Bureau prepared a letter to all county presidents and legislative chairmen and members of the Woman's Auxiliary urging them to write their congressmen in opposition to that portion of the proposed selective service act which would require registration of physicians up to the age of forty-five

"Mr Walsh represented the Society at the National Health Assembly in Washington, May 2 to 5 During the course of the month he visited Monroe, Nassau, Orange, and Cayuga counties and spoke on the need of a committee on public education and a speakers' bureau, and in Kings County he spoke on the subject of socialized medicine"

Publication—Dr Kosmak, chairman, reported that the Publication Committee met on June 9, 1948 Many routine matters were considered He stated the Committee had approved a supplement to the JOURNAL containing the Minutes of the 1948 Annual Meeting of the House of Delegates The cost of this has been estimated at about $3,000 It is proposed that this sum be taken from the proceeds of the Annual Meeting, provided the surplus is sufficient, otherwise it was proposed that it be left to the discretion of Mr Anderson as to how much of this money can be taken from the advertising income of the JOURNAL

It was voted that the Publication Committee be granted leave to print a supplement to the JOURNAL containing the minutes of the last meeting of the House of Delegates and to accept advertising therefor, the difference in cost to be allo-

cated from the convention fund if there is sufficient, of if not, from the JOURNAL fund.

Committee on Liaison with Veterans Administration.—Dr Bauckus chairman, reported as follows

"I would not have come to the Council meeting today except we have a meeting of our Board of Directors this afternoon to consider some very important matters.

"I would like first to say that the contract with Veterans Administration is supposed to end June 30 1948 Unless we have a new contract with the Veterans Administration the Veterans Medical Service Plan will have nothing further to do That will mean the loss of our contract and the loss of our contracts with our coordinators.

"Dr Harding will meet us again next Thursday with Dr Anderton and myself to discuss the work of the clinics here. Frankly he would like to take the work of the coordinators and put it into his own department.

'As chairman of the Committee from the American Medical Association, I have secured information about how the plan works in various states and in some it works very well indeed. Some of the reports indicate that the medical profession of the State is fairly well pleased with the work. This is of course an indication that there is a great variation in the way the Veterans Administration carries on its care of the veteran in the service-connected case. We know from statistics that we are not getting our share of fee basis work in New York State.

'I have a letter from the Medical Director of the California Physicians Service that says in part

I am enclosing a record of the activity of this program during the past year together with a statement of the amount of money involved and the number of veterans treated As you will note from these figures the program is steadily growing Most of the administrative problems have been ironed out and the operations are comparatively smooth. Our contract is on a cost plus basis so in addition to the amount of authorizations listed administrative expense is in addition. Very cordial relations exist between the C.P S and the branch office of the Veterans Administration.

'The Michigan Medical Service sent their executive, Mr Castaluzzi to see me in Buffalo to describe what they were doing and they have a very good program working through a similar so-called Blue Shield Plan. He tells me that several times they have had to go to Washington to protest certain acts of the Veterans Administration in Michigan but that generally they have received approval of what they wanted to do He said that the veteran was quite confident that he could have free choice of physician and demanded it that the Medical Society went along with that, and they were able to control the program very well.

'By the way, in California one month in 1947 they had $246 000 of authorizations the next month $206,000 It went down to $200 000 in November in March, 1948, $284,000 in April 1948 $287 000 I call your attention to the fact that there is quite a difference between the way they are working in California and the way they are doing in some of the other states.

'I will read one more item from the State of Indiana, in which the Executive Secretary says in part

'Home town care by family physician under agreement with VA existent Indiana since November 1946 satisfactory plan with minimal administrative difficulties but gradually reduction in such service has accompanied increased facilities in VA Regional Office with 16 to 18 full-time physicians.'

I would say that that is somewhat along the line of what we have had here

"If the Veterans Administration does not make a contract with the Plan, or if they want to do it with the coordinators out of the picture, I doubt very much whether the Board of Directors will want to go along with the whole contract That will throw the whole thing before the Council. It will then be the responsibility of the Council of the Medical Society of the State of New York to do what we are doing now

"I would like to have use made very much of Dr Winslow s Committee on Public Relations I have asked for that several times. I think they could do a lot for us

"I notice the report this morning does not say anything about the Veterans Administration at all I don t think it is our business, the Board of Directors business, to do all of this propaganda and public relations work for the State Medical Society It is a suggestion I have to make that this work be put under the direction of some member of the Council or possibly placed in Mr Farrell s Bureau. We operate more or less as an independent organization and we have no one to look after us except as we request various men in the organization I think if we had Mr Farrell s cooperation we might make use of some of the public relations that he gets but the point is that the veteran does not know his rights are gradually being taken away from him. He does not appreciate what it means to have free choice of physician, and that is especially important when we have Workmen s Compensation free choice Furthermore if we lose in this matter we may have some attack on the question of free choice in Workmen s Compensation. New York State of all states should certainly stand for free choice of doctor by the veteran and that is the resolution your House of Delegates adopted. Whether or not under the present circumstances the Veterans Administration will continue the contract I do not know but I want to call to the attention of the Council that matters are now approaching a critical stage. We shall have a meeting this afternoon and we shall have a further report after that.

After discussion, *it was voted* that all facilities of the State Society be used to assist Dr Bauckus and his Committee.

Woman's Auxiliary.—Dr Beckman, chairman reported that he had received a letter from Mrs Neptune stating that she had organized her committees and had visited several county societies.

Workmen's Compensation.—Dr Kenney chairman, reported verbally that "a meeting was held with Miss Donlon on the 11th of May to discuss the problem of rating Also another meeting was held by our Committee at the Hotel Pennsylvania following the State Society meeting Thirty or forty representatives of different counties came and discussed informally some of their grievances. I will embody these matters in a more formal report for the September meeting'

Coordinating Council of the Five Metropolitan Counties

Dr Frey reported as observer

New Business

Council Committee Appointments for the Year

1948–1949 —The list of council committees and subcommittees was submitted by the President and *approved* by the Council (The list will be published in the next issue of the JOURNAL)

Matters Referred from the House of Delegates to the Council

Section 77, House Minutes —Report of Reference Committee on Report of Council, Part XII Woman's Auxiliary

"We recommend to the Council that they recommend to the Board of Trustees that the appropriation be increased by $1,000", meaning appropriation for Woman's Auxiliary

It was voted that this recommendation be made

Section 79, House Minutes —Report of Reference Committee on Report of Council, Part XII Report of Committee on Questions on Ethics

It was voted to remove from the Principles of Professional Conduct of the Medical Society of the State of New York an addition entitled, "Publications for the Laity" which was appended to Section 31(b) It was also voted to "refer back to the Council for further study" the following proposed substitution

'Advertisements and Announcements of Publications for the Laity

"In the event that there is proposed any public announcement of or advertising in relation to any book or article or writing for the laity, such proposed announcement or advertising matter shall be submitted to the Council Committee on Public Relations prior to any public appearance of the announcement or advertising matter This reviewing committee shall render its opinion without unnecessary delay It shall be guided mainly by Section 31 of these principles of professional conduct, but shall be empowered to make such concessions as may be practiced and necessary, in considering the description of the title and contents of the publication, the professional standing and reputation of the author, and such other material through which the publisher may wish to arouse interest"

It was voted to refer this to the Committee on Ethics

Section 85, House Minutes —Report of Reference Committee on Report of Board of Trustees and Report of Treasurer

The Reference Committee recommended that the Council consider the advisability of discontinuing publication in the *Directory* of names of physicians in New Jersey and Connecticut until means can be devised to interest these physicians in defraying some of the cost of compiling and publication

It was also voted that the *Directory* be published every two years

The Council *voted* to refer this to the Publication Committee

Section 94, House Minutes —Report of Reference Committee on Report of Council, Part X Workmen's Compensation

It was

"*Resolved*, that the New York State Medical Society urge the Legislature of the State of New York, to amend the Workmen's Compensation Law to abolish the Medical Practice Committee, be it further

"*Resolved*, that the support of the county medical societies outside the metropolitan area is urged in order to re-establish a uniform administration of the law through New York State"

It was voted to refer this to the Legislative and Workmen's Compensation Committees

Section 96, House Minutes —Report of Reference Committee on Report of Council, Part IX Workmen's Compensation

Approval was voted to the recommendation "that regional representation from the eight district branches constitute an Advisory Council on Workmen's Compensation Matters acting as a Subcommittee of the Council Committee on Workmen's Compensation"

It was voted that the President be empowered to appoint such a committee

A recommendation was adopted that the "chairman of the Workmen's Compensation Board arrange for a yearly consideration and review of the Fee Schedule and that Miss Donlon designate it as a 'Minimum Medical Fee Schedule' in accordance with the provisions of Section 13, Workmen's Compensation Law"

It was voted to refer this to the Workmen's Compensation Committee

A recommendation of the Reference Committee was adopted that steps be taken for settlement of disputed medical bills in the four counties having a population of over one million through arbitration by a committee consisting of five physicians

It was voted to refer this to Workmen's Compensation Committee for consideration and report

Section 100, House Minutes —Report of Reference Committee on Report of Council, Part III Salary Scales for Public Health Physicians in the New York State Department of Health

The following resolution was adopted with the recommendation that the Council carry out its provisions

"WHEREAS, the health and welfare of the State of New York are dependent in many ways upon the satisfactory operation and performance of services provided through the New York State Department of Health, and

"WHEREAS, upon investigation it is evident that these services are suffering from a lack of essential medical personnel, and

"WHEREAS, the Commissioner of Health is handicapped in making replacements of highly important specialists because of inadequate salary scales, and

"WHEREAS, present available salaries for public health and laboratory physicians in the State Department of Health are not commensurate with incomes earned by physicians of like experience and training, and

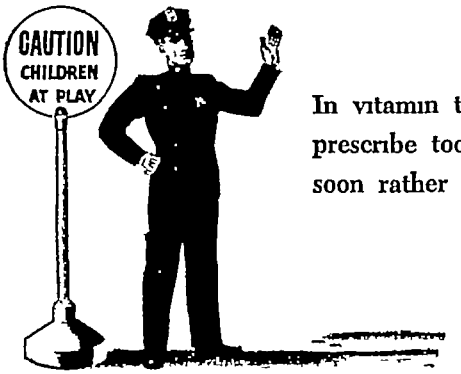
"WHEREAS, 48 out of 96 full-time medical positions in the State Department of Health remain unfilled as a result of the low salary scales now in effect, and

"WHEREAS, important public health programs and necessary research cannot be carried on because of these conditions, and

"WHEREAS, these deficiencies threaten the

[Continued on page 2192]

Extra Margin of Safety



In vitamin therapy " it is better to prescribe too much than too little, too soon rather than too late "*

*Spies T D J.A.M.A 122 497, 1943

When dietary vitamin supplementation is indicated, one BIOGEL capsule daily will normally meet requirements with a generous margin of safety The BIOGELS formula well exceeds established minimum daily requirements and fully satisfies the Recommended Dietary Allowances advanced by the Food and Nutrition Board of the National Research Council

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EACH CAPSULE CONTAINS:

Vitamin A	5000 USP Units
Vitamin D	500 USP Units
Vitamin B_1 (Thiamin Hydrochloride)	3.0 mg
Vitamin B_2 (G) (Riboflavin)	3.0 mg
Vitamin C (Ascorbic Acid)	100.0 mg.
Nicotinamide	50.0 mg
Calcium Pantothenate	5.0 mg
Vitamin B_6 (Pyridoxine)	1 mg
Vitamin E (Mixed Tocopherols)	5.0 mg.



[Continued from page 2190]

health and welfare of the people of New York State, now, therefore be it

"*Resolved*, that the Medical Society of the State of New York respectfully petition the Governor of New York to take prompt action to rectify this situation by means of

"1 Upward salary scale revision,

"2 The delegation of greater latitude to the Commissioner of Health to permit recruitment of personnel above salary scale minimums, and

"3 Simplification of Civil Service recruitment procedures as they pertain to medical personnel"

It was voted that the secretary be instructed to communicate with Governor Dewey stating that the State Society favors an increase in such salaries

Section 102, House Minutes—Report of Reference Committee on Report of Malpractice Insurance and Defense Board

A recommendation was adopted that the Malpractice Insurance and Defense Board continue the Group Plan of Malpractice Insurance

Section 103, House Minutes—Report of Reference Committee on Report of Malpractice Insurance and Defense Board Malpractice Insurance and Public Relations

It was

"*Resolved*, that the Council of the Medical Society of the State of New York be instructed to study the Alameda County Plan, and as soon as feasible to institute procedures which will end in the employment of measures of like nature in the constituent county societies or district branches"

It was voted to refer this to the Malpractice Insurance and Defense Board

Section 106, House Minutes—Report of Reference Committee on Report of Council, Part IX Report of Subcommittee on Cults

In approving the report, the Reference Committee "urges the Council to introduce the necessary recommended injunctive legislation in the 1949 legislative session"

It was voted that this be referred to the Committee on Legislation

Section 111, House Minutes—Report of Reference Committee on Report of Council, Part XII The Report of the Temporary State Commission on Coordination of State Activities

A summary of the Wicks Commission Report was referred to the Council "with the direction to take the necessary action for the best benefit of the public and the medical profession"

It was voted to refer this to the Legislative Committee with power

Section 112, House Minutes—Report of Reference Committee on Report of Council, Part IX Podiatry Legislation

The following resolution was referred to the Council for appropriate and necessary action

"WHEREAS, podiatry is a technical minor adjunct of orthopedics, and

"WHEREAS, many systemic diseases have manifestations in lesions of the lower extremity, and

"WHEREAS, the Institute of Podiatry is not a medical school, and

"WHEREAS, the licensed podiatrists have been active in attempting to pass legislation in this State to extend the limitations of their licensure, and

"WHEREAS, the treatment of disease constitutes the practice of medicine under the laws of this State and,

"WHEREAS, the passage of such legislation would be detrimental and hazardous to the public health and welfare, therefore, be it

"*Resolved*, that the Medical Society of the State of New York put itself on record as being opposed to such legislation, and be it further

"*Resolved*, that the Governor and members of both Senate and Assembly be sent copies of this resolution, and be it further

"*Resolved*, that the Legislative Committee and our Albany representative be instructed to govern themselves accordingly, and be it further

"*Resolved*, that the content of these resolutions be made known to the Board of Regents of the State of New York"

It was voted to refer this to the Legislative Committee with a request that they report at the next Council Meeting

Section 113, House Minutes—Report of Reference Committee on Report of Council, Part IX, Amendment of Hospital Lien Law to Include Physicians' and Surgeons' Bills

The House of Delegates passed the following

"*Resolved*, that the 1949 Session of the New York State Legislature be requested to amend Section 189 of the Lien Law to include the bills of physicians and surgeons for services rendered in the same cases as enumerated in said Section 189 of the Lien Law"

It was voted that this be referred to the Legislative Committee

Section 114, House Minutes—Report of Reference Committee on Report of Council, Part IX Legislative Committee Activities

After explanatory paragraphs and

"WHEREAS, it would seem to be within the province of some executive division of the Society to institute such changes as may be indicated to the end that the component county societies will become an active integral part of the legislative program,

it was

"*Resolved*, that this matter be referred to the Council for consideration and institution of such measures as will make our legislative program an outstanding success"

It was voted to refer this to the Legislative Committee for study and action

Section 115, House Minutes—Report of Reference Committee on Report of Council, Part IX Partnership and Group Practice

The Reference Committee recommendation was carried that the following resolution "be submitted to the Council for action before the 1949 legislative session"

[Continued on page 2194]

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Dexedrine's anti-depressant effect is notable for its freedom from distracting elation, irritability and inward nervous tension. Its uniquely "smooth" action spares the patient the uncomfortable feeling of "drug stimulation".

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Dexedrine T M Reg U.S. Pat Off for dextro-amphetamine sulfate S.K F

[Continued from page 2192]

"WHEREAS, the New York State Legislature enacted Senate Introductory 740 Printing 2142 in the 1947 Legislature which is now a chapter of the laws of 1947 of the State of New York, and

"WHEREAS, said law amends the Education Law in relation to the practice of medicine by physicians as partners and permits the pooling of fees and monies for medical services by the members of the partnership or group and employes of such partnerships or groups, and

"WHEREAS, said bill does not specify or limit the number of partnerships or groups to which an individual physician may belong, and

"WHEREAS, under the present bill, a physician might be a member of more than one group and use this as a subterfuge for the division of fees, and also create a situation where said member of more than one partnership might be tempted to render services for less than the agreed fee among the group, and

"WHEREAS, said bill permits a division of the fees with an employe who does not necessarily have to be a physician under the terms of the bill, therefore, be it

"*Resolved*, that we request that legislation be introduced in the 1949 session of the New York State Legislature amending the recently enacted law concerning group practice or partnership, and incorporating therein provisions or amendments to correct the foregoing objections"

It was voted to refer this to the Legislation Committee

Section 116, House Minutes—Report of Reference Committee on Report of Council, Part IX X-ray as a Practice in Medicine

The House voted to accept in principle and refer to the Council for action the following proposed bill for introduction into the 1949 New York State Legislature

"X-ray diagnosis means that method of medical practice in which demonstration and examination of the normal and abnormal structures, parts, or function of the human body are made by use of x-rays, and any person who holds himself out to diagnose or able to make or makes any interpretation or explanation by word of mouth, written or otherwise, of the meaning of fluoroscopic or registered shadow or shadows of any part of the human body made by the use of x-rays, and also the use of x-rays or radium for the treatment of any human ailment, shall be deemed to be engaged in the practice of medicine within the meaning of this article, and Section 1262 as follows

The provision of this article shall be deemed to prohibit the practice of x-ray diagnosis, x-ray therapy, or radium therapy, as defined in subdivision 7A of Section 1250 of this chapter, by any person other than a person licensed as a physician, a dentist, an osteopath, or a podiatrist"

"Be it further

"*Resolved*, that the Medical Society of the State of New York actively work for the passage of this bill in the Legislature during the year of 1949"

It was voted to refer this to the Committee on Legislation

Section 117, House Minutes—Report of Reference Committee on Report of Council, Part IX Supplementary Report of Council, Economics

The following proposed amendment to the Education Law was referred to the Council for action

'Section 6501 Definition

'4 The practice of medicine is defined as follows A person practices medicine within the meaning of this article, except as hereinafter stated, who holds himself out as being able to diagnose, treat, operate or prescribe for any human disease, pain, injury, deformity or physical condition, and who shall either offer or undertake, by any means or method, *including the use and interpretation of radiographs, fluoroscopic observations, prescription and administration of radiation therapy, examination of human tissues or fluids, physical therapy procedures, and anesthesiology*, to diagnose, treat, operate, or prescribe for any human pain, injury, deformity or physical condition" (Italicized phrases are new matter)

"Your Subcommittee recommends that the House of Delegates authorize the Council to request members of the 1949 New York State Legislature to amend the Education Law as above specified"

It was voted that the Council feels it unwise to change the definition of the Practice of Medicine as contained in the Medical Practice act

Section 119, House Minutes—Report of Reference Committee on Report of Council Part II Diversion of Federal Funds for Pediatric Undergraduate, Graduate, and Postgraduate Education

The House voted to have the following resolution "referred to the Council for their study"

"WHEREAS, the American Academy of Pediatrics has now concluded a complete two and one-half year survey of pediatric education in all of the approved medical schools and the pediatric departments of all hospitals and of all other child health services including the care rendered by private physicians, state by state and county by county throughout the United States,

"WHEREAS, this survey places the American Academy of Pediatrics in a unique position of knowing the facts related to the needs of child health services,

"WHEREAS, the Executive Board of the American Academy of Pediatrics has come to the conclusion that the first and most fruitful approach toward a national program for the improvement of child health must be predicated upon increasing and strengthening the teaching of pediatrics at the undergraduate, graduate, and postgraduate levels for general practitioners and pediatricians,

"WHEREAS, a program for strengthening pediatric education will increase teaching budgets of medical schools and pediatric departments of hospitals, which even now do not have adequate financial support,

"WHEREAS, the Executive Board of the American Academy of Pediatrics, after due deliberation as to the availability of possible private sources of revenue, has taken under consideration the use of Federal funds to assist these schools and hospitals in a program designed to further pediatric education,

"WHEREAS, to this proposal for Federal funds has been added the requisite that such funds be

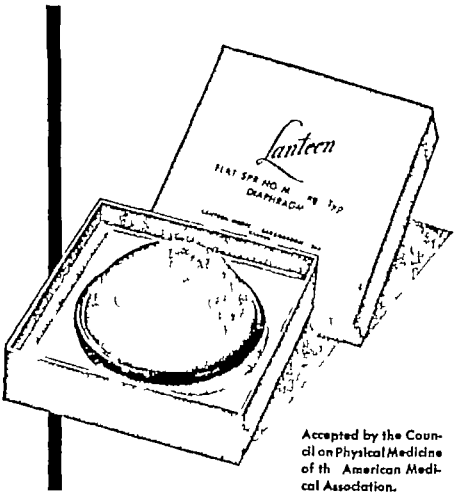
[Continued on page 2196]

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[Continued from page 2194]

allotted according to the judgment of nine representative pediatricians and without interference with the policies or internal affairs of the institutions concerned,

"WHEREAS, the Executive Board of the American Academy of Pediatrics proposes to submit to the Congress a constructive program for child welfare based upon the findings of its survey, having thus gathered together the pertinent facts pertaining to child care and pediatric education, therefore be it

"*Resolved*, that the House of Delegates of the Medical Society of the State of New York approve the recommendation of the Executive Board of the American Academy of Pediatrics that Federal grants, such as are now available in other fields of medicine, be provided for training in the medical care and health supervision of children,

"*Resolved*, further that this resolution be introduced at the meeting of the House of Delegates of the American Medical Association in June, 1948"

It was voted to refer this to the Committee on Economics

Section 130, House Minutes—Advisability of Holding Special Meeting of House in 1948

The House voted "a suggestion to the Board of Trustees and Council to consider" whether or not to hold a special meeting of the House of Delegates in 1948

It was voted that no action be taken at this time

Section 134, House Minutes—Report of Reference Committee on Report of Council, Part XI Scientific Medical Advertising

The Reference Committee Report was adopted recommending that "an advisory committee be formed, comprising members of the clinical group coupled with pharmacologists trained in the clinical and research approach, with the avowed purpose of assisting in the evaluation of products prior to their acceptance for advertising in the JOURNAL"

The Reference Committee also suggested the following policy be established

1 That Council-approved preparations be accepted without question for advertising in the JOURNAL.

2 That all other products submitted be passed upon by the recommended advisory committee

3 That the final responsibility of acceptance or rejection should rest entirely with the Publication Committee

4 That advertising other than that falling in the scientific field be not included in the purview of this report, but be left to the discretion of the Publication Committee

It was voted that the president be empowered to appoint an Advisory Committee to the Publication Committee for consideration of new advertising in the JOURNAL.

Section 135, House Minutes—Report of Reference Committee on Report of Council, Part XI Premature Publicity of Medical Matters by State Officers

The following resolution was adopted

"WHEREAS, it has been the policy of governmental agencies in the past to promote press releases on the expansion of services and the introduction of new programs which involve the physicians of the community when the cooperation of the local physicians is both desirable and necessary,

"WHEREAS, subsequent discussions for modification of the projected program to render it effective and efficient improperly places the physicians in the light of obstructing such expansion of services to the public, therefore be it

"*Resolved*, that the Medical Society of the State of New York go on record as advising the interested governmental agencies that the Medical Society of the State of New York is always ready to conduct preliminary discussions about such projects which involve medical service and the allied branches of activity of the government, before press releases are promoted on such matters"

It was voted that this be referred to the Public Relations Committee

Section 138, House Minutes—Report of Reference Committee on Report of Council, Part VIII Hospital and Medical Care for Veterans

The following was "accepted" in principle, but the final wording was left to the Council to determine

"WHEREAS, the Medical Society of the State of New York believes that veterans who have been injured or disabled in the service of their country are entitled to the highest type of medical and hospital care, and

"WHEREAS, Point Seven of the Ten Point National Health Program of the American Medical Association on 'Veterans' Need for Hospital and Medical Care' reads

> 'A program for national health should include the administration of medical care, including hospitalization, to *all* veterans, such medical care to be provided preferably by a physician of the veteran's choice, with payment by the Veterans Administration through a plan mutually agreed upon between the state medical association and the Veterans Administration'

and

"WHEREAS, no differentiation is made in the above-mentioned program between veterans suffering from illness or disabilities incurred in or aggravated by military services and those veterans suffering from illness or disabilities not incurred in or aggravated by military service, and

"WHEREAS, the present policy of the Veterans Administration is to furnish medical care and hospitalization to veterans whose illness and disabilities were not incurred in or aggravated by military services only when such veterans are not able to 'pay the necessary expense of hospital care' and when ' a bed is available in an existing facility', and

"WHEREAS, the Veterans Administration has neither the legal right nor the administrative machinery to investigate affidavits on financial ability of such nonservice-connected cases, ' to pay the necessary expense of hospital care', and

"WHEREAS, nearly two thirds of the beds in Veterans Administration hospitals are now filled with patients with nonservice-connected disabilities, and

"WHEREAS, the Veterans Administration now

[Continued on page 2198]



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*Snyder M. L., Klehn, C. L. and Christopherson, J. W. Mil. Surgeon, *97*: 380 1945 Shipley, E. R. and Dodd, M. C.: Surg., Gynec. & Obst., *83*: 366 1947 Mays, J. L. J. Med. Assoc. Georgia, *36*: 265, 1947 Curtis, L.: Surg. Clin. N. America, 1466 (Dec.) 1947

[Continued from page 2196]

has 126 hospitals at a cost of over one billion dollars, and

"WHEREAS, the Veterans Administration currently has over 5,000 beds closed because of inability to obtain personnel without lowering the standards of medical care, and

"WHEREAS the unlimited expansion of Veterans Administration hospitals will lead to an inferior grade of medical and hospital care for veterans and at the same time injure the quality of hospital service that is available for the entire population by draining professional and technical personnel away from hospitals which serve the public as a whole, be it

"*Resolved*, that the Medical Society of the State of New York, in view of the foregoing, instruct members of the House of Delegates of the American Medical Association to request at the next regular session of the House of Delegates of the American Medical Association that action be taken to amend Point Seven of the Ten Point National Health program of the American Medical Association on 'Veterans Need for Hospital and Medical Care' to read

'A program for national health should include the administration of medical care, including hospitalization, to all veterans currently entitled to such medical care and hospitalization under existing Federal statutes, such medical care to be provided preferably by a physician of the Veteran's choice with payment by the Veterans Administration through a plan mutually agreed upon between the state medical association and the Veterans Administration', and

"*Resolved*, that the House of Delegates of the American Medical Association be requested to go on record as favoring Congressional action to interpret the following requirements of admission of nonservice-connected cases to Veterans Administration Hospitals

1 The ability ' to pay the necessary expense of hospital care', and

2 ' if a bed is available in an existing facility', and

"*Resolved*, that the House of Delegates of the American Medical Association at their next meeting be requested to go on record as favoring a definite ceiling on the number of beds to be provided in Veterans Administration hospitals, and that such a ceiling be placed at 140,000 beds, the number already authorized by Congress"

It was voted to refer this to the delegates to the A.M A. and to Dr Winslow, chairman

Section 143, House Minutes—Report of Reference Committee on Report of Planning Committee for Medical Policies Redistricting District Branches

The House voted "that the House of Delegates of the Medical Society of the State of New York refer with power to act to the Council the matter of redistricting the county medical societies into district branches with the creation, if necessary, of a ninth district branch"

It was voted to refer this to the Planning Committee for Medical Policies

Section 144, House Minutes—Report of Reference Committee on Report of Planning Committee for Medical Policies State Legislation Qualifying Title "Dr"

The following amended resolution was referred to the Council for study and implementation

"WHEREAS, in the healing arts it has been traditional in America to associate the title 'Dr' with Doctors of Medicine, and

"WHEREAS, in the past decade others than licensed Doctors of Medicine have been misleading the public by the unqualified use of the title 'Dr' on signs and stationery, and

"WHEREAS, such common practice is deleterious to the health of the public, therefore be it

"*Resolved*, that it be made mandatory by State law for all licensed practitioners of medicine and the allied healing arts to append to their names the degree which is recognized by license together with the State license number, and be it further

"*Resolved*, that the House of Delegates of the New York State Medical Society direct the Legislative Committee to draft a bill fulfilling the intent of these resolutions and introduce it for enactment into law at the next session of the New York State Legislature"

It was voted to refer this to the Legislative Committee

Section 145, House Minutes—Report of Reference Committee on Report of Planning Committee for Medical Policies U S Participation in the World Health Organization

Referring to S J Res 98, H J Res 161, the House of Delegates

"*Resolved*, that the House Rules Committee be petitioned by the Medical Society of the State of New York to present this bill for a vote by the House of Representatives in order that the leadership of American Medicine and Public Health may have its rightful voice in dealing with international health problems"

It was voted that the Secretary be instructed to write to the House Rules Committee to that effect

Section 153, House Minutes—Report of Reference Committee on Report of Council, Part IV Public Health Activities B—Group Practice

The Reference Committee reported that there had been filed "a rather extensive, informative report concerning existing rules and regulations covering partnerships and groups in practice" It was recommended that this matter should be given detailed and serious study, and further recommended that it be referred to the Council for appropriate action"

It was voted to refer this to the Planning Committee

Section 154, House Minutes—Report of Reference Committee on Report of Council, Part IV Premarital Blood Tests

The following resolution was passed

"WHEREAS, under the present public health law thirty days are allowed in which applicants may apply for a license for marriage, and

"WHEREAS, after receiving a license for marriage sixty days are allowed for the applicant to exercise his right to use such license, and

"WHEREAS, this gives the applicant ninety days in which he or she may become infected, which in effect partially nullifies the benefits of this law, therefore be it

[Continued on page 2200]

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[Continued from page 2196]

has 126 hospitals at a cost of over one billion dollars, and

"WHEREAS, the Veterans Administration currently has over 5,000 beds closed because of inability to obtain personnel without lowering the standards of medical care, and

"WHEREAS the unlimited expansion of Veterans Administration hospitals will lead to an inferior grade of medical and hospital care for veterans and at the same time injure the quality of hospital service that is available for the entire population by drawing professional and technical personnel away from hospitals which serve the public as a whole, be it

"*Resolved*, that the Medical Society of the State of New York, in view of the foregoing, instruct members of the House of Delegates of the American Medical Association to request at the next regular session of the House of Delegates of the American Medical Association that action be taken to amend Point Seven of the Ten Point National Health program of the American Medical Association on 'Veterans' Need for Hospital and Medical Care' to read

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"*Resolved*, that the House of Delegates of the American Medical Association be requested to go on record as favoring Congressional action to interpret the following requirements of admission of nonservice-connected cases to Veterans Administration Hospitals

1 The ability ' to pay the necessary expense of hospital care', and

2 ' if a bed is available in an existing facility', and

"*Resolved*, that the House of Delegates of the American Medical Association at their next meeting be requested to go on record as favoring a definite ceiling on the number of beds to be provided in Veterans Administration hospitals, and that such a ceiling be placed at 140,000 beds, the number already authorized by Congress"

It was voted to refer this to the delegates to the A M A. and to Dr Winslow, chairman

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The House voted "that the House of Delegates of the Medical Society of the State of New York refer with power to act to the Council the matter of redistricting the county medical societies into district branches with the creation, if necessary, of a ninth district branch"

It was voted to refer this to the Planning Committee for Medical Policies

Section 144, House Minutes—Report of Reference Committee on Report of Planning Committee for Medical Policies State Legislation Qualifying Title "Dr"

The following amended resolution was referred to the Council for study and implementation

"WHEREAS, in the healing arts it has been traditional in America to associate the title 'Dr' with Doctors of Medicine, and

"WHEREAS, in the past decade others than licensed Doctors of Medicine have been misleading the public by the unqualified use of the title 'Dr' on signs and stationery, and

"WHEREAS, such common practice is deleterious to the health of the public, therefore be it

"*Resolved*, that it be made mandatory by State law for all licensed practitioners of medicine and the allied healing arts to append to their names the degree which is recognized by license together with the State license number, and be it further

"*Resolved*, that the House of Delegates of the New York State Medical Society direct the Legislative Committee to draft a bill fulfilling the intent of these resolutions and introduce it for enactment into law at the next session of the New York State Legislature"

It was voted to refer this to the Legislative Committee

Section 145, House Minutes—Report of Reference Committee on Report of Planning Committee for Medical Policies U S Participation in the World Health Organization

Referring to S J Res 98, H J Res 161, the House of Delegates

"*Resolved*, that the House Rules Committee be petitioned by the Medical Society of the State of New York to present this bill for a vote by the House of Representatives in order that the leadership of American Medicine and Public Health may have its rightful voice in dealing with international health problems"

It was voted that the Secretary be instructed to write to the House Rules Committee to that effect

Section 153, House Minutes—Report of Reference Committee on Report of Council, Part IV Public Health Activities B—Group Practice

The Reference Committee reported that there had been filed "a rather extensive, informative report concerning existing rules and regulations covering partnerships and groups in practice" It was recommended that this matter should be given detailed and serious study, and further recommended that it be referred to the Council for appropriate action"

It was voted to refer this to the Planning Committee

Section 154, House Minutes—Report of Reference Committee on Report of Council, Part IV Premarital Blood Tests

The following resolution was passed

"WHEREAS, under the present public health law thirty days are allowed in which applicants may apply for a license for marriage, and

"WHEREAS, after receiving a license for marriage sixty days are allowed for the applicant to exercise his right to use such license, and

"WHEREAS, this gives the applicant ninety days in which he or she may become infected, which in effect partially nullifies the benefits of this law, therefore be it

[Continued on page 2200]



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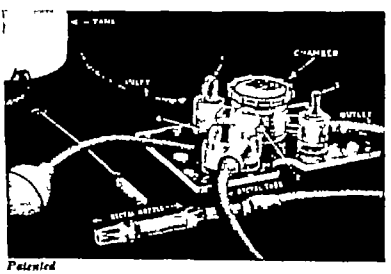
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[Continued from page 2200]

to the individual and private practice of medicine, and

"WHEREAS, such a plan would appear to place hospitals in the business of practicing medicine, and

"WHEREAS, such a procedure, if left uncontrolled and uncurbed, except in the matter of undergraduate teaching of medical students, might lead to unforeseen difficulties for the practice of medicine, therefore be it

"*Resolved*, that the Council be instructed to refer this matter to an appropriate, existent committee of the Council to study this problem and to use its efforts to prevent hospitals from practicing medicine and interfering with the private practice of medicine and to use all moral and, if necessary, legal methods for this purpose"

It was voted to refer this to the Economics Committee

Section 166, House Minutes—Report of Reference Committee on Report of Council, Part VI Insurance Forms

The following resolution was adopted

"WHEREAS, physicians are asked to make out many illness and mortality forms of insurance companies, and

"WHEREAS, the filling of such forms often requires considerable time, and

"WHEREAS, these forms are generally never alike, be it

"*Resolved*, that the Council appoint a committee to meet with a committee of the Association of Life Insurance Companies for the purpose of standardizing the illness and mortality forms and thereby make them more brief"

It was voted to refer this to the Economics Committee

Section 168, House Minutes—Report of Reference Committee on Miscellaneous Business A Blood Banks

The House approved the following resolution

"WHEREAS, the National Red Cross has undertaken the establishment of a nation-wide Blood Donor Service Program, the basic philosophy of which is to provide blood for all, and which provides in some areas not only for donor service but also for collecting, processing and distributing blood from a centralized bank, and

"WHEREAS, free service for all economic levels of the population is not compatible with established patterns of American life, and

"WHEREAS, a centralized blood bank service under the Red Cross may tend to destroy existing blood banks in the hospitals, and

"WHEREAS, all professional and technical phases of a blood bank program should be under the control and supervision of the physicians of the community and

"WHEREAS, a permissive program adapted to meet local needs has been approved in Westchester County in full cooperation with the Westchester Chapter of the American Red Cross, now therefore be it

"*Resolved*, that the New York State Medical Society urge County Societies to consider the establishment of a Red Cross Blood Donor Service Program similar to that proposed for Westchester which provides

"1 Red Cross Blood Donor Service,

"2 Free Red Cross blood for the medically indigent who are unable to provide replacement,

"3 The continuation of existing hospital blood banks and encouraging the establishment of banks in other hospitals,

"4 Implementation and supplementation of the existing blood bank services,

"5 All professional and technical control and supervision of the donor service program vested in a committee of physicians appointed by the county medical society,

"6 And general coordination of the program through a committee representing the Red Cross, the county hospital association and the county medical society"

It was voted to refer this to the Committee on Public Health and Education

The House voted "that it was in favor of the purposes of" the American Association of Blood Banks

Also, the House approved

1 The recommendation of the Reference Committee that a special committee on blood banks be appointed

2 It is suggested that the principles of the American Association of Blood Banks be approved and ultimately have blood banks of the State possibly become associated in this group

3 It recommended that the special committee use as an example "the good cooperative plan proposed and agreed upon by both the Red Cross and Westchester County Society and in the process of being established in Westchester County" In this the medical profession operated the blood banks and supervises them, and that the Red Cross cooperates in the obtaining of blood donors and transportation of donors and blood

It was voted that the president be empowered to appoint a subcommittee under Dr Mitchell's Committee on Public Health and Education

Section 173, House Minutes.—1949 Meeting of House of Delegates

The House recommended the acceptance of the invitation of the Medical Society of the County of Erie to hold the 1949 Annual Meeting of the Medical Society of the State of New York in Buffalo It also voted that this information be communicated to the Council in order that the time of the meeting may be set

It was voted that the date and place of meeting be left to the Convention Committee

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Cayuga	C T Yarington	Moravia	J D Hammond	Auburn	L H Rothschild	Auburn
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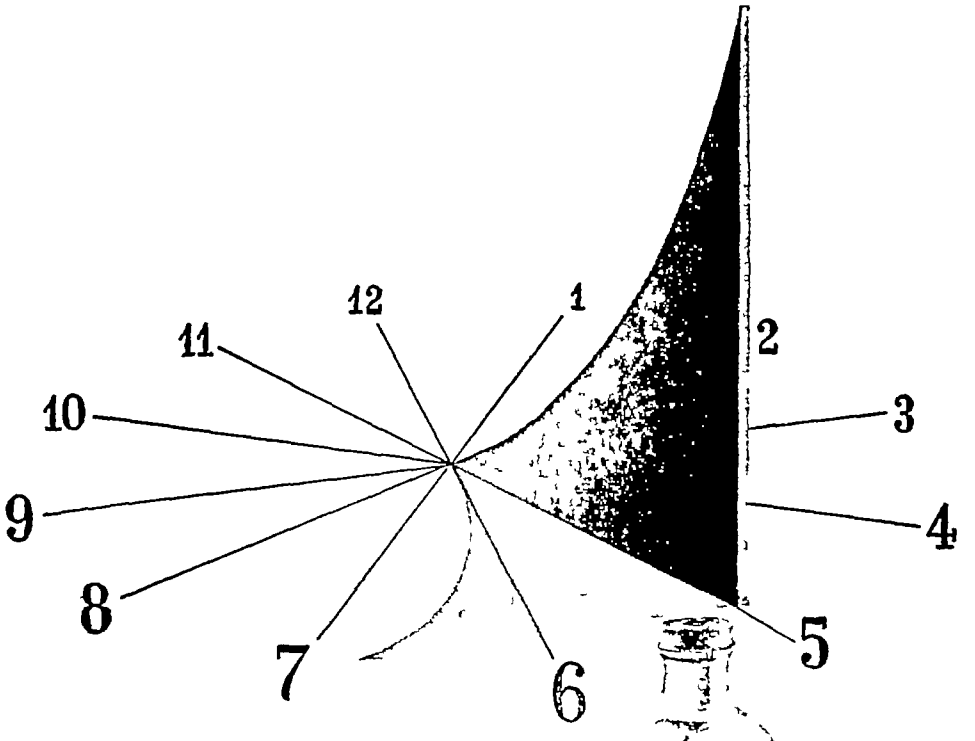
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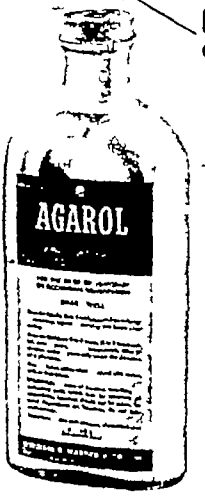
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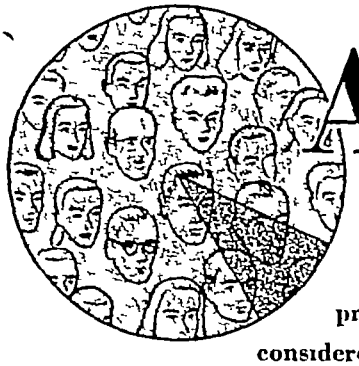
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CONTENTS

SCIENTIFIC ARTICLES

The Diagnosis and Management of the Postcholecystectomy Syndrome, *J Russell Twiss, M D*, and *R Franklin Carter, M D* 2245

Acute Pancreatitis, *H L Bockus, M D*, and *Edward C Raffensperger, M D* 2252

Streptomycin in Tuberculosis Experimental Observations on Efficacy, Shortcomings, and Limitations, *William H Feldman, D V M, D Sc* 2260

Rickettsialpox, *Harry M Rose, M D* 2266

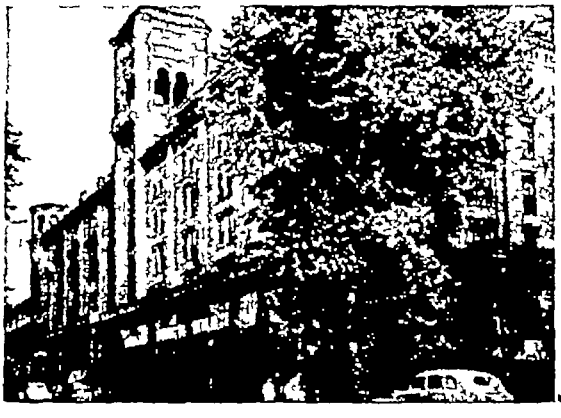
An Evaluation of the Present Status of Antihistaminic Substances, *W. C Spain, M D*, and *F A Pflum, M D* 2272

(*Continued on page 2212*)



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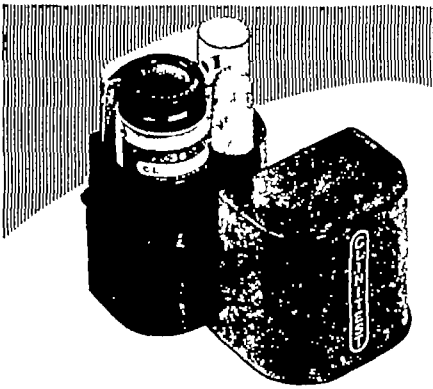
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(CONTENTS—Continued from page 2210)

Guided Liver Biopsy through Laparotomy Incision, *Edward E Jemerin, M D* 2276
Selection of Hypertensive Patients for Sympathectomy, *Henry I Russek, M D, F A C P, James L Southworth, M D, F A C S*, and *Burton L Zohman, M D, F A C P* 2278

CASE REPORTS

Tuberculous Meningitis Complicated by Pregnancy, *E G Silverman, M D*, and *T M Feinblatt, M D* 2280
Hepatitis Due to Cincophen, with Recovery, *Zachary H Benjamin, M D* 2282

EDITORIALS

Resist Beginnings 2239
Fatal Accidental Poisoning 2240
Current Editorial Comment 2241
Facts About Nutrition 2243

GENERAL FEATURES

Necrology 2287
Medical News 2288
Woman's Auxiliary 2294
Hospital News 2298
Books 2304

MISCELLANEOUS

State Society Officers 2214, 2216, 2218
Council Committees for 1948–1949 2285
County Society Officers 2310

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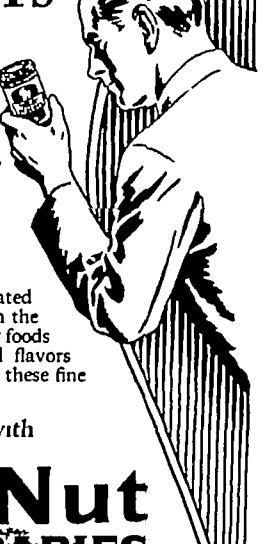
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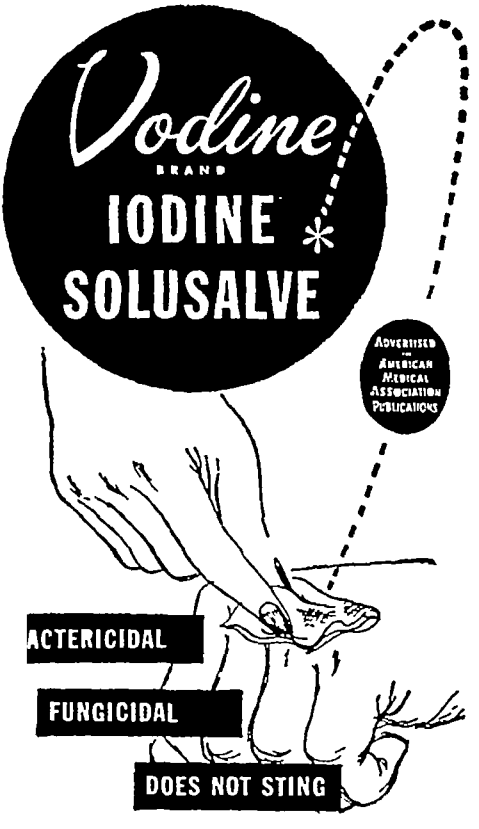


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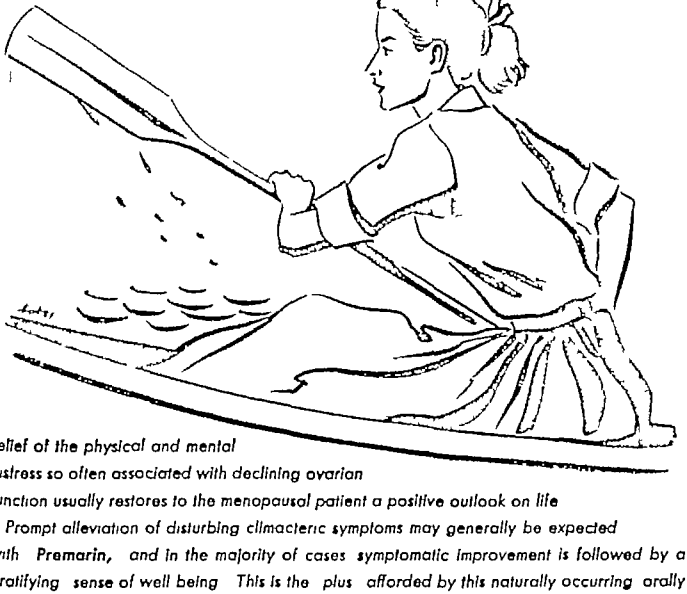
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INDEX TO ADVERTISERS

American Pharmaceutical Company	2234
Ames Company, Inc	2211
The Arlington Chemical Company	2303
Armour Laboratories	2297
Atlantic Manufacturing Corp	2293
Ayerst, McKenna & Harrison Limited	2221
Dr Barnes Sanitarium	2311
Beech-Nut Packing Co	2219
Milton H Berry Foundation Schools	2312
Ernst Bischoff Company Inc.	2208
Borcherdt Malt Extract Company	2312
Brewer & Company Inc.	2291
Brigham Hall Hospital	2311
Brunswick Home	2309
Ca Ma-Sil Company	2214
S H Camp and Company	2228
G Ceribelli & Co	2303
Ciba Pharmaceutical Products Inc	3rd cover
The Clifton Springs Sanitarium and Clinic	2210
Coca-Cola Co	2318
Commercial Solvents Corporation	2315
Crane Discount Corporation	2311
The Denver Chemical Mfg Company	2316
Dome Chemicals Inc	2218
H E Dubin Laboratories Inc	2226
Endo Products Inc	2299
Falkirk in the Ramapos	2309
Fellows Medical Mfg Co Inc	2236
C B Fleet Co Inc	2229
Flint, Eaton & Co	2216
Fried & Kohler, Inc.	2207
Halcyon Rest	2311
J E Hanger	2312
Harmon Chemicals Inc	2316
Hill-Top Sanitarium	2311
Holbrook Manor	2311
Homemakers Products Corporation	2233
Interpines	2309
Lakeside Laboratories Inc.	2237
Eli Lilly and Company	2238
Louden-Knickerbocker Hall Inc	2309
M & R Dietetic Laboratories Inc	2301
Mandl School	2312
The Maples Inc	2309
The S E Massengill Company	2307
Mead Johnson & Co	4th cover
Merck & Co Inc	2230
The Wm. S Merrell Company	2nd cover
The National Drug Company	2223
Nestle s Milk Products, Inc	2295
New York Medical Exchange	2312
Nitchie School of Lip Reading, Inc	2312
Num Specialty Co	2311
Paine Hall	2312
Parke Davis & Company	2227
Pediforme Shoe Co	2316
Raymer Pharmacal Company	2313
R J Reynolds Tobacco Company	2209
Wm S Rice Inc	2226
Sandoz Chemical Works Inc	2212
Saratoga Springs Authority	2305
Julius Schmid Inc	2222
Schering Corporation	2217, 2231
G D Searle & Co	2215
E R. Squibb & Sons	2225
Standard Pharmaceutical Co , Inc	2311
Swift & Company	2224
Teca Corporation	2314
Charles B Towns Hospital	2309
Twin Elms	2309
U S Vitamin Corporation	2232
Van Patten Pharmaceutical Co	2303
Vodine Company	2220
West Hill	2311
Westwood Pharmacal Corp	2235
Whitbread & Co Ltd	2293
White Laboratories, Inc	Between 2224–2225
Winthrop-Stearns Inc	2213
Wyeth Incorporated	2317

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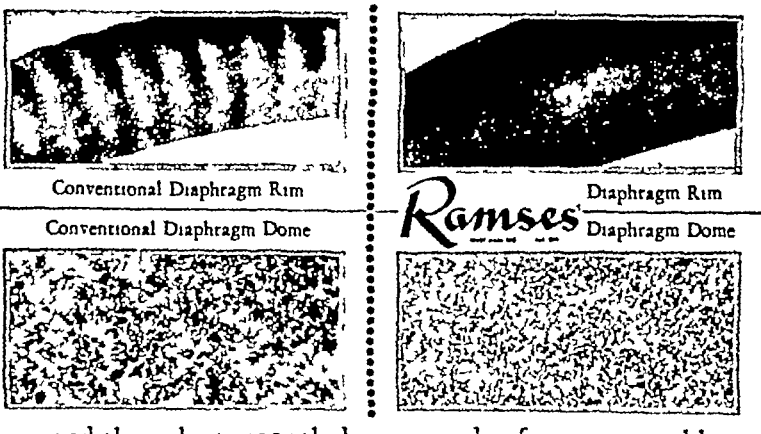
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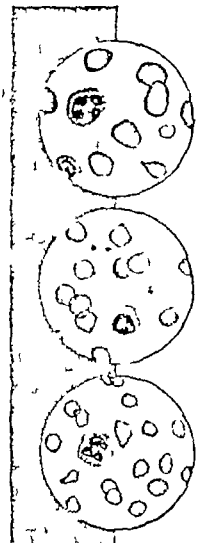
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1 Cartwright G E Blood 2 111 (March) 1947

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INDEX TO ADVERTISED PRODUCTS

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Anavodin (Ernst Bischoff Company Inc) 2208
Ca-Ma-Sil (Ca-Ma-Sil Company) 2214
Cepacol (The Wm S Merrell Company) 2nd cover
Chorionic Gonadotropin (Armour Laboratories) 2297
Climitest (Ames Company, Inc) 2211
Combisul (Schering Corporation) 2217
Crystalline Penicillin G Potassium (Commercial Solvents Corporation) 2315
Daxalan (Dome Chemicals Inc) 2218
Diaparene (Homemakers' Products Corp) 2233
Digilanid (Sandoz Chemical Works, Inc) 2212
Diphtheria-Tetanus-Pertussis (Parke, Davis & Company) 2227
Essenamine (Winthrop-Stearns Inc) 2213
Etocylol (Ciba Pharmaceutical Products, Inc) 3rd cover
Fello-Sed (Fellows Medical Mfg Co Inc) 2236
Galatest (The Denver Chemical Mfg Co) 2316
Harplex (Harmon Chemicals, Inc) 2316
Iletin (Eli Lilly and Company) 2238
Iodine Solusalve (Vodine Company) 2220
Liafon (E R Squibb & Sons) 2225
Massengill Powder (The S E Massengill Company) 2307
Meomine (Wyeth Incorporated) 2317
Mercuhydrin (Lakeside Laboratories, Inc) 2237
Metamucil (G D Searle & Co) 2215
Multi-Beta Liquid (White Laboratories, Inc) Between 2224-2225
Neo-Cultol (The Arlington Chemical Co) 2303
Nucarpon (Standard Pharmaceutical Co , Inc) 2311
Octaplex (American Pharmaceutical Company) 2234
Phospho-Soda (C B. Fleet Co , Inc) 2229
Premarin (Ayerst, McKenna & Harrison Limited) 2221
Protinal Powder (The National Drug Company) 2223
Pyridium (Merck & Co , Inc) 2230
Ramses (Julius Schmid, Inc) 2222
Raysal with Succinate (Raymer Pharmacal Company) 2313
Sodascorbate (VanPatten Pharmaceutical Co) 2303
Strean-Tabs (Atlantic Manufacturing Corp) 2293
Syrup Choline (Flint, Eaton & Co) 2216
Thesodate (Brewer & Company, Inc) 2291
Thum (Num Specialty Co) 2311
Trimeton (Schering Corporation) 2231
Tri-sulfanyl (U S Vitamin Corporation) 2232
Vifort (Endo Products Inc) 2299
Westsal (Westwood Pharmacal Corp) 2235

Dietary Foods

Baby Foods (Beech-Nut Packing Co) 2219
Evaporated Milk (Nestle's Milk Products, Inc) 2295
Malt Soup (Borcherdt Malt Extract Company) 2312
Milk Stout (Whitbread & Co Ltd) 2293
Pablum (Mead Johnson & Co) 4th cover
Similac (M & R Dietetic Laboratories, Inc) 2301
Strained Meats (Swift & Company) 2224

Medical and Surgical Supplies

Artificial Eyes (Fred & Kohler, Inc) 2207
Artificial Limbs (J E Hanger) 2312
Hydrogalvanic Generators (Teca Corporation) 2314
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Supports (S H Camp and Company) 2228
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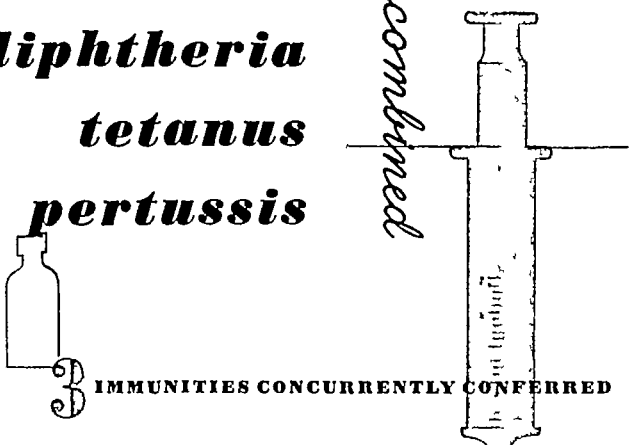
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tetanus
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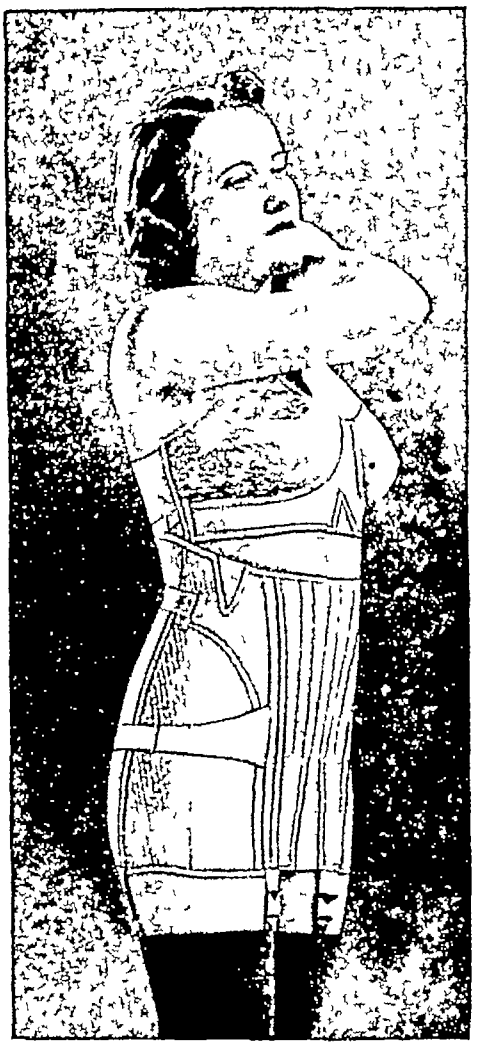
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In fulfillment of modern authoritative requirements, this dependable saline laxative provides an ease of administration and a gently efficient action that have made it a prescription favorite for *many* physicians *whenever* thorough safe elimination is desired

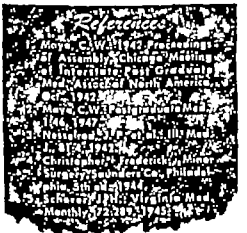
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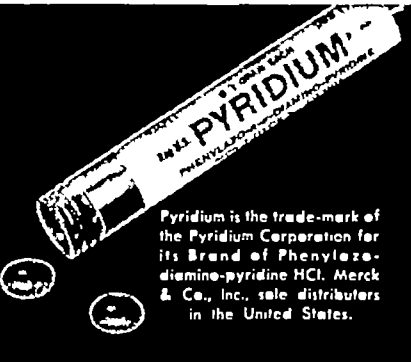
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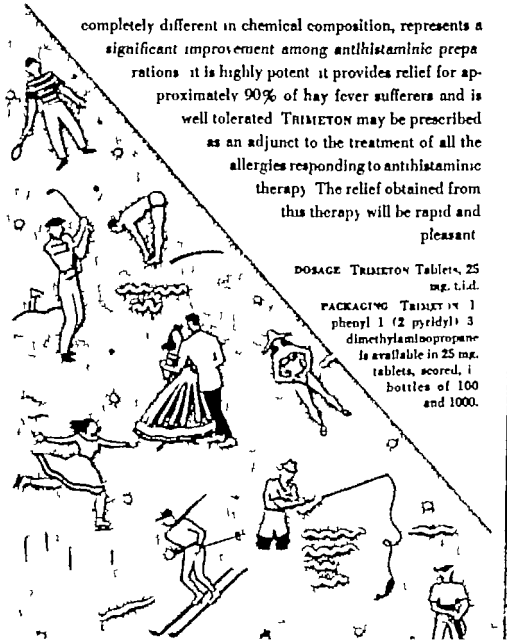
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(*brand of prophenpyridamine*)

completely different in chemical composition, represents a *significant improvement among antihistaminic preparations* it is highly potent it provides relief for approximately 90% of hay fever sufferers and is well tolerated TRIMETON may be prescribed as an adjunct to the treatment of all the allergies responding to antihistaminic therapy The relief obtained from this therapy will be rapid and pleasant

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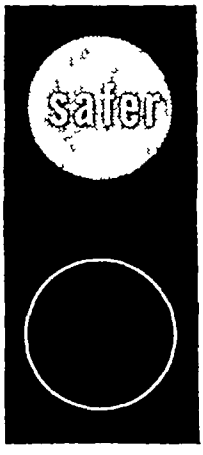


NOTICE THAT IT RELIEVES

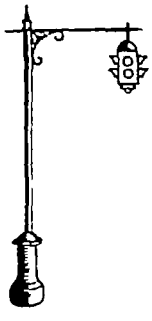
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(Proc Soc Exp Biol & Med 64 393, 1947)

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sulfonamide therapy



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syrup and tablets

sulfathiazole
sulfadiazine
sulfamerazine

formula Each teaspoonful of syrup (5 cc) or each tablet contains

Sulfathiazole	0 162 Gm (2 5 gr)
Sulfadiazine	0 162 Gm (2 5 gr)
Sulfamerazine	0 162 Gm (2 5 gr)

(Tri Sulfanyl syrup also contains Sodium Citrate 0.375 Gm (5 8 gr) in a pectinized, vanilla flavored base)

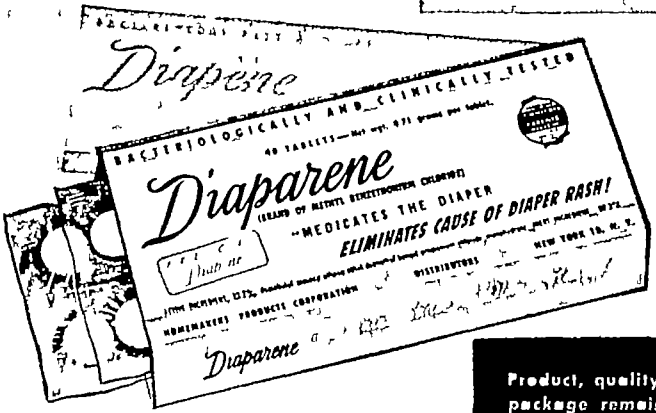
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REFERENCES:

1 Cooke, J V., Brennemann Practice of Ped 4: Chapter 41 1945
2. Benson R A. et al: J Ped 31:369 754 1947
3 Sullivan N.: Int'l Congress of Ped., Mt Sinai Hospital New York, 1947

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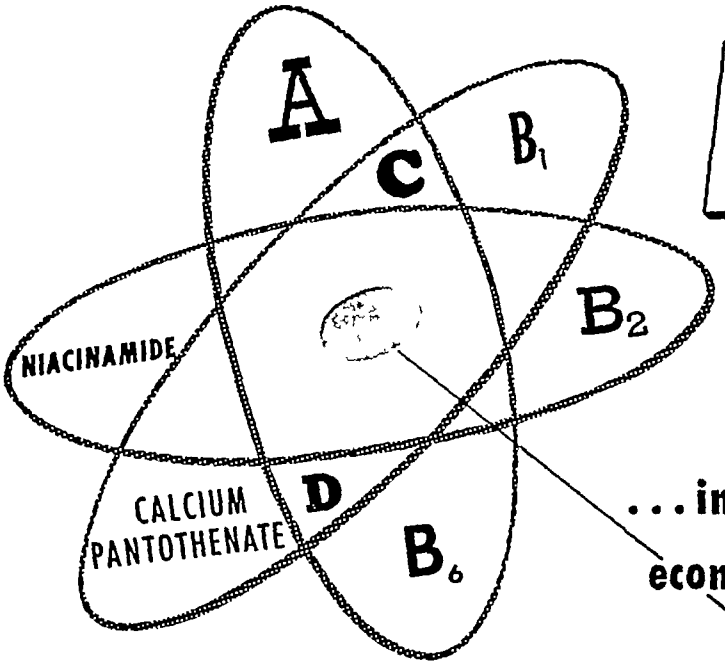
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the important VITAMINS in the nutritional orbit ...in potent, balanced economical, easy-to-take capsules



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MORE VIGOROUS HEALTH may be derived by patients with vitamin-poor menus, by fortifying their diets once daily with

ONE SMALL OCTAPLEX CAPSULE

Vitamin A	5,000 U.S.P. Units
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Ascorbic Acid (Vitamin C)	50 mg
Thiamine HCl (Vitamin B_1)	3 mg
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So easy to take youngsters swallow them readily—so high in potency and easy on the purse, patient appreciate their economy.

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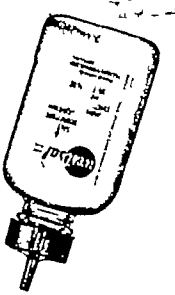
1 Bulletin National Research Council, Nov 1943

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new and ONLY sodium free
salt substitute that tastes
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that makes food taste exactly like
food seasoned with salt
no bitter, disagreeable taste

WESTSAL — in convenient liquid form — can
be used as safely and freely as salt
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WESTSAL enables patients with

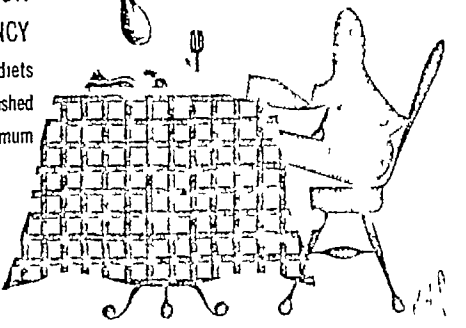
CONGESTIVE HEART FAILURE
HYPERTENSION
TOXEMIAS of PREGNANCY

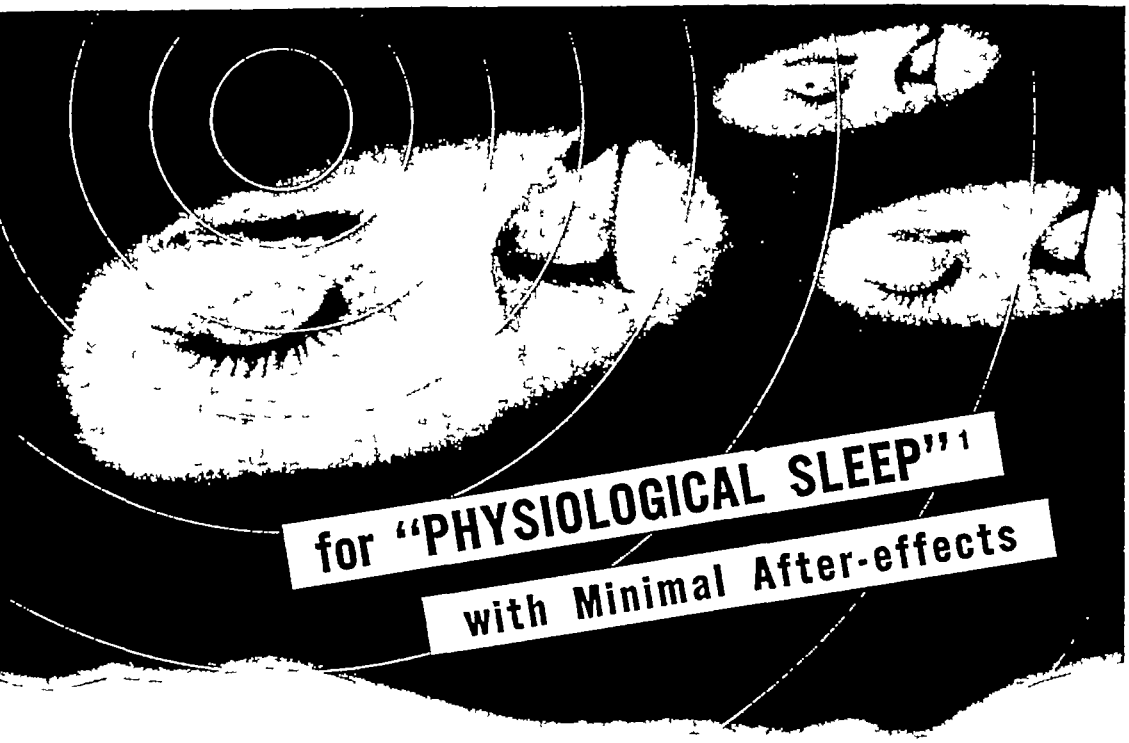
1. to adhere faithfully to low salt diets
2. enjoy food and be adequately nourished
3. keep harmful sodium intake at a minimum

WESTSAL is a solution of lithium chloride with small amounts of citric acid and potassium iodide (iodine traces)
● Bottles of 2¼ oz

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Goodman and Gilman observe that it "is unfortunately neglected today," and that the present widespread use of the barbiturates has " caused the physician to lose sight of the fact that chloral hydrate is still one of the cheapest and most effective hypnotics"[2]

In FELLO-SED, supplementation with calcium bromide and atropine sulfate largely overcomes unwanted side-actions, enhances the sedative effect and provides valuable antispasmodic activity It is presented in palatable liquid form

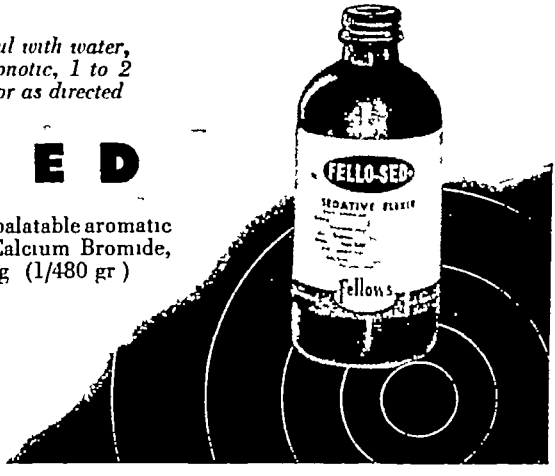
[1]N.N.R., 1947 p 398
[2]Goodman L. & Gilman A., The Pharmacological Basis of Therapeutics MacMillan 1944 pp 177-8

Available in 8 fluidounce bottles

Adult Dose. As a sedative ½ to 1 teaspoonful with water, every 3 or 4 hours or as directed As a hypnotic, 1 to 2 teaspoonfuls or more with water at bedtime or as directed

FELLO-SED

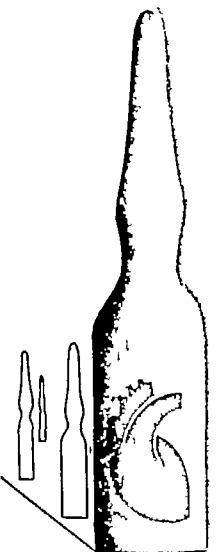
FORMULA Each fluidram (4 cc) contains, in a palatable aromatic vehicle Chloral Hydrate, 0 5 Gm (7½ gr), Calcium Bromide, 0 5 Gm (7½ gr), Atropine Sulfate, 0 125 mg (1/480 gr)



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a natural preference



A revealing test[1] recently was conducted on a group of cardiac patients in congestive failure, treated with intramuscular injections of different mercurial diuretics, the identities of which were unknown at the time to both patients and observers. The results showed that the majority clearly evinced a decided—and natural—preference for a diuretic agent that caused the least pain and discomfort—

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Similarly, Gold *et al*[2] prefer MERCUHYDRIN in their routine treatment of the failing heart because "it is less irritant to the muscle and is less apt to produce pain"

MERCUHYDRIN is also preferred by the treating physician because of its dependability It is well tolerated systemically,[3,4] excellent water and salt diuresis is obtained,[1,4-6] and the diuretic response by intramuscular injection is the same as by intravenous injection.[1,4] With a systematic schedule of early and frequent administration producing controlled diuresis MERCUHYDRIN aids greatly in prolonging the life, decreasing the invalidism and adding to the comfort of the cardiac patient. Symptoms of failure such as peripheral edema, paroxysmal dyspnea or acute pulmonary edema, are prevented or minimized, and the distressing consequences of intermittent massive diuresis are obviated.

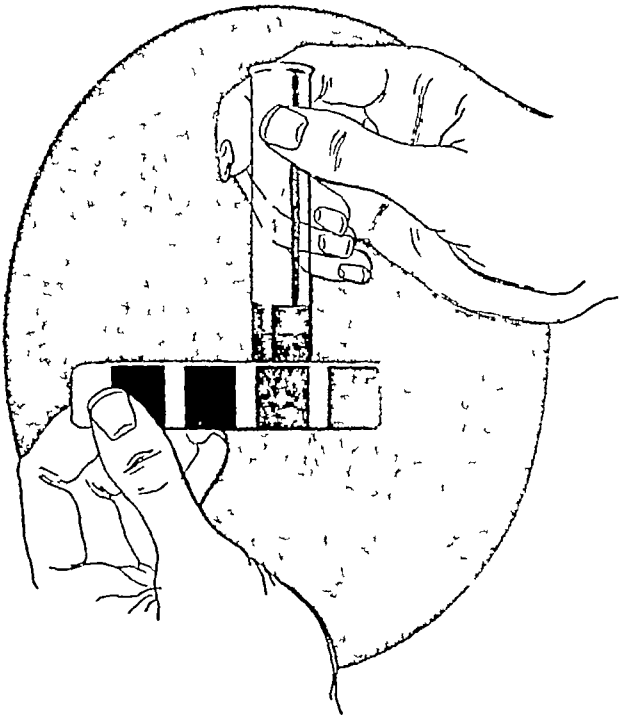
DOSAGE: MERCUHYDRIN 1 cc. or 2 cc. intramuscularly or intravenously injected daily or as indicated until a weight plateau [illegible]. But apparently the interval between even injections is prolonged to determine the one [illegible] permitted [illegible] between maintenance injections.

PACKAGING: MERCUHYDRIN (mercaptide sodium solution) is available in 1 cc. and 2 cc. ampuls.

BIBLIOGRAPHY:

(1) Meibell W.; Gold, H. [illegible] and Clarke D. A. J. Pharmacol. & Exper. Therap. 64:281 (1938). (2) Gold, H. and others Am. J. Med. 3:683, 1947. (3) Yes and Neocothal Remedies, Philadelphia, J. B. Lippincott Co. 1917, p. 296. (4) Finkelstein, M. H. and Smyth, C. J.: J. Mich. M. Soc. 45:1 (1946). (5) Rose, I. H. and Burk, G. E. Proc. Soc. Exper. Biol. & Med. 63:213, 1946. (6) Griggs, D. L., and Johns, V. J. Influence of mercurial diuretics on sodium excretion, [illegible] be published.

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Few therapeutic procedures can be used with such precision and with such assurance of benefit as the modern treatment of diabetes mellitus Not only can the degree of defect in the metabolic capacity of the diabetic be readily determined, but it is easy to increase the patient's capacity if desirable If his own supply of insulin is insufficient to support the normal metabolic load, it can be made adequate by supplementing with Insulin administered hypodermically

For prompt effect—

Iletin (Insulin, Lilly), 40 and 80 units per cc

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Intermediate effects may be obtained by suitable admixtures of Insulin and Protamine Zinc Insulin

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VOLUME 48 | OCTOBER 15, 1948 | NUMBER 20

Editorials

Resist Beginnings

Precisely as international relations reached a new low and the prospect for enduring peace appeared to be dwindling, Dr John J Masterson, president-elect of the Medical Society of the State of New York, spoke at Schoharie and Saratoga Springs before the Third and Fourth District Branch meetings of the Society on the topic "Resist Beginnings"

Using John Bigelow's essay on this subject as his point of departure, Dr Masterson said

> It is not enough that we, the medical profession, be aware of the disaster that is at the bottom of the cliff down which we are sliding The people must know it, too, for in this country the voice of the people can still be heard And the people are not going to take our word for it. Enemies can say that we are seeking our own advantage. We must summon witnesses who have no stake in the outcome, whose opinions are more likely to be considered objective

While the officials of the U S Government were vainly striving for understanding in Europe with the advocates of collectivism and world revolution so that peace and prosperity might be restored to the world, advocates of collective medicine for this nation in the form of National Health Insurance are active. Principally this action emanates from the Federal Security Administration

Said Dr Masterson, advocating that the medical profession resist beginnings,

> In agitation for compulsory sickness insurance we are in this country again confronted with the danger of collectivism, which is another word for socialism. Just before Labor Day, President Truman advocated what he called "national health insurance." I do not need to tell you how damaging such a measure would be to the health of the people. What is necessary to emphasize is the need for continuous and uninterrupted opposition to this kind of thinking, which is intellectually dishonest. It is dishonest because it promises that the people are going to get something which in reality is never going to be delivered. It is the first step toward authoritarian government in which the citizen becomes a slave of

the state Even if the danger of the passage of such a law is not great, *the need to combat this type of thinking remains of first importance,** for the more prevalent it becomes, the greater the risk that step by step we shall slip gradually into a national state of mind more and more receptive to ideas which will ultimately mean the abdication of the citizen from control of his own private affairs

The spectacle of the Western nations struggling with the advocates of collectivism, the accumulating experience of English physicians with the socialist government in Great Britain, makes it harder and harder to see what possible good could accrue to the American people by the adoption of a system of governmental control of medical institutions and services which is un-American, unsuitable, and unworkable

Resist beginnings, let there be no appeasement here of the advocates of national health insurance

* Italics ours Ed

Fatal Accidental Poisoning

Says the *Statistical Bulletin* in discussing barbiturates as a leading cause of fatal accidental poisoning

Too many people who keep substances containing poison around the house are ignorant of their potential dangers As a consequence of the accidental misuse of ingestion of drugs and poisonous substances, about 1,500 persons, more than a quarter of them children under five, die in the United States each year This figure excludes deaths due to gas or food poisoning

Substantial long-term gains have been made against deaths from accidental poisoning Over the period 1933 to 1946, the death rate has averaged about one per 100,000 population annually, or about one-third less than in the preceding decade

Fewer accidental deaths have been recorded in recent years from virtually every type of poison-containing compound with the notable exception of the barbiturates, which now are far and away the leading cause of fatal accidental poisonings In 1946 barbituric acid and its derivatives accounted for more than a quarter of all fatal accidental poisonings in the United States, in the early 1930's their share was only about $1/18$ of the total [1]

It would thus appear that in only sixteen years barbituric acid and derivatives have accounted for from $1/18$ to more than $1/4$ of the total of accidental poisonings Furthermore,

In striking contrast to wood and denatured alcohol, barbituric acid derivatives caused the deaths of a larger number of women than of men policyholders—38 and 28, respectively The female deaths from this cause accounted for 40 per cent of all female deaths from poisoning Other studies show a much higher ratio of female to male deaths from barbiturates While these deaths occur mainly among adults, there were five deaths among children two years old or younger in the present investigation

Notwithstanding the long term gains in reduction of accidental poisonings and the improvement in specific categories, the barbiturates continue to be increasingly fatal, apparently Unquestionably, the legitimate use of barbiturates has been on the increase during the period 1933 to 1946, but the mounting fatalities from their *accidental* ingestion suggests that unconsumed quantities of the drug in amounts capable of producing death are accessible to the persons who are *accidentally* killed, especially to women

After all the warnings that have been given and the tragic incidents reported in the press, it is hard to understand why anyone would store disinfectants, insecticides, and similar materials near food, food containers, or medicines But this dangerous practice and others like it persist The marked rise in deaths from the barbiturates is especially disturbing Greater control by the health authorities over the sale of these sedatives may bring about a reduction in mortality from them

One understands that disinfectants, insecticides, lye, and household ammonia, in quantities dangerous to life, might be found in any household, but why barbiturates? Certainly the matter is one in which the medical profession should be interested, and for which it has a certain responsibility

More rigorous control of the sale of these

[1] Met. Life Ins. Co (Aug.) 1948, p. 7

sedatives is certainly indicated and should be put into effect without loss of time. Caution should also be exercised by physicians prescribing the drug to inform their patients of the possible dangers of careless placement of the medicine and the toxic character of the drug in excess of legitimate amounts

Current Editorial Comment

What Price the Mere Prolongation of Life? Recently, this JOURNAL published an editorial under the title "The Meanest Man in the World "[1] The magazine *Time* subsequently quoted it, which was subtly flattering But when a physician colleague took the trouble to write us a day or so ago about it, the experience was indeed heartening

Let us hasten to say that our colleague read the editorial in this JOURNAL, well, at any rate he alleges that he did He said in his communication that he had thought of the editorial many times and especially recently We quote in part, from his letter

> Three times this week I have been assailed by articles extolling the mere prolongation of the life expectancy of the average American citizen One article was in the monthly *Bulletin* of the New York City Department of Health The second was in *New York Medicine* The third was in a recent monthly magazine issued by a reputable drug firm. These might have passed unnoticed into my files were it not for your editorial and had not my wife insisted on visiting the replica of Mr Blanding's "Dream House," now open for inspection on the southeast corner of Fifth Avenue and Forty eighth Street, New York City Visitors pay what they feel they can afford for an inside view, not only of the house, but of a garage with two new cars in it Their donations go to the New York Heart Association and in return they are given blanks upon which they may supply the last line of a jingle extolling the wondrous life that will be ours when the Damoclean sword of heart disease has been removed from over the head of the human race
>
> My wife is no more avaricious than most women but she wants that house and the two cars that the successful completer of that verse will win. Accordingly my every waking hour which should have been devoted to amassing strength while in the relaxing atmosphere of the home has been dissipated in the invention of lines which exhort us to live longer by the discovery and the eradication of the causes of heart disease Not only must they exhort effectively, but they have to scan
>
> I might have been able to bear up under all this without boiling over, had I not met an aging contemporary who had recently survived a serious illness. When I asked him how he felt he said he felt fine—so fine, indeed, that his only worry was that he did not see how he was going to be able to afford to live as long as he apparently was going to do His ancestry was one of almost incredible longevity He felt he had done his duty to his country by having grandsired ten grandchildren But he did not relish the idea, he said, of living to the age when he might be a burden not only upon them, but upon generations yet unborn.
>
> The gentleman had something there What is the virtue of this indiscriminate prolongation of life? What is the virtue of life, simply as such? I do not perceive it. Does not Shakespeare remark of the ages of man
>
> Last scene of all,
> That ends this strange eventful history,
> Is second childishness and mere oblivion,
> Sans teeth, sans eyes, sans taste sans everything?

Our correspondent presents something for superconscientious geriatrists to think about Recently, employers have been chary of hiring old people, the young have been resentful of old people filling jobs which the younger folks want, and retirement to the bosom of O.A.A. leaves much to be desired We repeat that the geriatrists have a real job on their hands

Use and Abuse A correspondent writes us concerning the tearing down of a hospital building erected thirty-six years ago, and, of course, the erection of a new one He admitted that the building was not strictly up to date For instance, there was no system for emptying bed pans, the operating room was not air conditioned, the air of the operating room was not sterilized

Great and enduring monuments, buildings of brick and stone are not essential for the best care of the sick As we have often emphasized, it is not the building, but rather the people who are in it that make

[1] M y 15 1948, p. 1133

for successful medicine and surgery, or for that matter any kind of treatment of the sick

We read recently in the New York *Times* a headline "U S Backing Seen for Hospital Plan"[1] "Dr Bourke says State will get $6,000,000 July 1st for Start of Big Building Program"[2]

Such headlines, we are sure, make the public pulse beat faster, because the public pulse is a generous, warmhearted pulse, a pulse to admire

We quote again from the New York *Times*

> Dr Frederick MacCurdy, commissioner of mental hygiene for New York State, said yesterday, "If we got $20,000,000 more tomorrow we wouldn't know what to do with it because we can't get the trained personnel!"[3]

The column from which we quote is headed "Vast Need is Seen for Psychiatrists" Mere money will not alone produce competent professional personnel

Again we quote from an editorial in the New York *Times* which may explain one of the reasons why the V A hospitals are crowded

> Today, the VA operates a total of 103,189 beds, and has 5,649 beds closed because of inability to obtain personnel Their patient census is 95,652 in their own hospitals, and 13,849 in Army, Navy, civilian, and contract hospitals Of the 109,601 patients (as of January 15, 1948), however, 66 per cent are *nonservice-connected*, that is, the disabilities for which they are hospitalized have no relationship to their military service
>
> There are 18,026 awaiting admission to VA hospitals, of which only 88 are definitely service-connected The hospitalization policy in VA hospitals is that veterans with service-connected disabilities shall have admission priority, but that veterans with nonservice disabilities may be admitted, if, *by their own statement*, they are unable to pay for hospital care, and "if a bed is available in an existing facility"[4 5]

In other words, if they will sign the pauper's oath But the pauper's oath is so well concealed in small type in the mass of verbiage on the admission application that the honest veteran may well have no idea of what he is signing

From the New York *Times* we quote again

> (in) a long range coordinated hospital plan to cost $750,000,000 and provide 54,000 additional beds, Federal, State, and Local funds would be used and local facilities expanded [6]

This, at a time when our magnificent voluntary hospitals are facing bankruptcy When the shortage of nurses is acute When there are 4,000 applicants for 110 vacancies in the first-year class of the College of Physicians and Surgeons of Columbia University All of which does not make one sanguine as to the early filling up of shortages

Are there political implications in this state of mind? Treat veterans and their families for nonservice-connected disabilities which the law was never designed to cover Pauperize some of our population by permitting them to sign documents of the contents of which they are ignorant Of course no one should ever sign anything of which he has not read and understood every word, but apparently some people occasionally do

Give the public the impression that there is a grave shortage of hospital beds There is, but largely because voluntary hospitals have not the funds to maintain the beds they have, also because they cannot pay their nurses a decent living wage For the same reason, there is a shortage of orderlies, and no system has been set up for the training of men which would set them on the same respected level now occupied by the trained nurse

Pamperize and pauperize

When shall we learn to make the best of what we have? When, instead of tearing down existing institutions, when building costs are at their highest, shall we learn to make the best of them? When shall we learn not to give the public the impression that anyone remotely connected with a veteran—as who is not—is entitled to "free" hospital care and surgical services? When shall we learn to train more male and female attendants for the sick? When shall we expand our facilities to train more doctors who just want to look after sick people? Please notice that we say "shall" and not "will" The verb betrays a certain amount of confidence in our fellow man When shall we cease to pamperize and pauperize?

[1] New York Times June 11 1948.
[2] Executive Director New York State Joint Hospital Survey and Planning Commission.
[3] New York Times June 8 1948
[4] February 22 1948
[5] Italics ours.—Ed.
[6] June 6 1948

FACTS ABOUT NUTRITION

Prepared by the School of Nutrition, Cornell University, Ithaca
Norman S Moore, M D , Editor

The Caloric Nutrition of Adults*

The present concept of optimum nutrition calls for liberal intakes of various nutrients—amounts markedly in excess of experimentally determined minimum needs In the case of calories, however, a different situation exists A sufficient calorie intake is of primary importance because specific nutrients cannot effectively function unless there is an adequate fuel supply for body processes Calorie intakes in marked excess of actual needs are undesirable, particularly in the adult Thus, the problem of optimum calorie nutrition is to avoid excess, as well as to provide enough

Postwar European observations have made us especially conscious of the dire effects of caloric undernutrition In this country, however, apart from certain special cases resulting from illness, poverty and ill advised dieting, the primary calorie problem in the adult is one of overconsumption rather than the opposite.

For a long time physicians have recognized, from their own observations and from the statistics of life insurance companies, that marked overweight favors the development of many degenerative diseases and is of major concern in the medical management of these diseases [1] Recently, controlled research has served to strengthen this point of view and magnify its importance.

As an example of animal experimentation, McCay and coworkers have shown in the case of rats that those which are restricted in calorie intake after middle life thereafter live longer than those allowed ad libitum intakes [2] The recent report by Wilens provides an excellent example of convincing findings in regard to men.[3,4] On the basis of a detailed study covering 1,250 autopsies at Bellevue Hospital, the relationship of body condition and fat deposits to the incidence and severity of atherosclerosis of the aorta and main branches of the coronary arteries was clearly demonstrated

In our modern life the caloric needs of the adult have tended to become less because of shorter working hours, increased mechanization, and the automobile, despite the fact that many people use their leisure time for increased activity in sports, gardening, and otherwise While many middle-aged persons appear to be as active as they were at thirty, actually they tend to conserve energy by avoiding unnecessary movements both in their occupational and general activities Further, their basal metabolism is decreased somewhat from its former level Thus, with advancing age, weight increase tends to be inevitable unless a conscious effort is made to consume less than formerly

It is impossible to set up specific figures defining caloric intakes for the individual which will provide adequate nutrition without overconsumption, because of the many variables involved, such as activity, body size, age, environment, individual differences in efficiency of caloric conversion, and others Further, activity categories such as "sedentary" "moderately active" and "very active" cannot be specifically differentiated, and they tend to grade into each other Thus, the calorie intakes recommended by the Food and Nutrition Board which have recently been revised downward are recognized to be useful only as general guides and subject to a large factor of variability in the case of the individual

*This discussion does not consider pregnancy and lactation.

It is agreed that weight maintenance is the most useful indicator of caloric needs Thus, the proper calorie intake is the one which over an extended period will maintain the body weight at the proper level, according to height, age, sex and body weight This definition recognizes that the desirable weight can differ according to body build as well as weight It provides for the needed adjustments in accordance with activity

The important question which is immediately asked, however, is what is the proper weight and how does one arrive at it for a given individual It must be agreed that precise information on this point is not available Modern students of the subject, however, feel that the data published by the Metropolitan Life Insurance Company under the heading of "ideal" weights are useful guides These tables are reproduced here for selected heights to guide physicians in their day-to-day determinations of the caloric needs of patients falling into the categories of "small frame," "medium frame," and "large frame" In each case the proper weight is expressed as a range of approximately 10 per cent It would seem unrealistic to attempt to specify an exact figure Presumably fluctuations within ranges given are ordinarily of little or no significance

[1] Met Life Ins Co Statistical Bull 18 2 (1937)
[2] McCay, C M, Maynard L A Sperling, G and Osgood H S Nutrition 21 45 (1941)
[3] Wilens S L Arch Int Med 79 129 (1947)
[4] Wilens S L Am J Path 23 793 (1947)

IDEAL WEIGHTS FOR WOMEN—AGES 25 AND OVER*

Height (with Shoes)		Weight in Pounds (as Ordinarily Dressed)		
Feet	Inches	Small Frame	Medium Frame	Large Frame
5	0	105–113	112–120	119–129
5	2	110–118	117–125	124–135
5	4	116–125	124–132	131–142
5	6	123–132	130–140	138–150
5	8	129–139	137–147	145–158
5	10	136–147	145–155	152–166
6	0	141–153	151–163	160–174

* From Metropolitan Life Insurance Co Statistical Bull. 23 6 (1942)

IDEAL WEIGHTS FOR MEN—AGES 25 AND OVER*

Height (with Shoes)		Weight in Pounds (as Ordinarily Dressed)		
Feet	Inches	Small Frame	Medium Frame	Large Frame
5	4	122–132	130–140	137–149
5	6	129–139	137–147	145–157
5	8	136–147	145–156	153–166
5	10	144–155	153–164	161–175
6	0	152–164	161–173	169–185
6	3	168–180	176–189	184–202

* From Metropolitan Life Insurance Co Statistical Bull 24 6 (1943)

SCIENTIFIC EXHIBITS
1949
ANNUAL MEETING

Applications for space for the scientific exhibits should be made directly to the Chairman of the Subcommittee on Scientific Exhibits of the Convention Committee

Dr J G Fred Hiss
505 State Tower Building
Syracuse 2, New York

The Annual Meeting will be held May 2 to 6, 1949, at the Hotel Statler in Buffalo

No applications can be considered after January 1, 1949

There will be two groups of awards

Awards in Group I are made for exhibits of individual investigation, which are judged on the basis of originality and excellence of presentation

Awards in Group II are made for exhibits which do not exemplify purely experimental studies and which are judged on the basis of excellence of presentation and correlation of facts

W P ANDERTON, M D, *Secretary*

Scientific Articles

THE DIAGNOSIS AND MANAGEMENT OF THE POSTCHOLECYSTECTOMY SYNDROME

J Russell Twiss M.D and R Franklin Carter M D New York City

(From the New York Post-Graduate Hospital)

IN DISCUSSING the diagnosis and management of the postcholecystectomy syndrome we have made an effort to limit this term to those patients having postoperative symptoms referable to the biliary tract. This qualification is necessary because a review of the literature indicates that every patient having symptoms after operation is put in this group regardless of the source of the symptoms Our principal objectives have been to develop diagnostic routines which would indicate the source and nature of disorders of the biliary tract, both before and after operation The use of comprehensive methods of diagnosis should lower the incidence of the postcholecystectomy syndrome by aiding the proper selection of patients for operation and also should improve the results of treatment in those patients having symptoms after operation.

This investigation includes 295 patients who have had cholecystectomy A group of 121 calculus cases having no symptoms postoperatively was first studied to determine whether the initial diagnostic studies or operative findings revealed any significant differences between them and patients having postoperative symptoms. A group of 35 noncalculus patients having had cholecystectomy was then studied for the purpose of finding any significant diagnostic or operative findings which might explain the persistence of symptoms in the 20 patients so afflicted Finally a group of 159 calculus patients having post cholecystectomy symptoms is presented

In this group, detailed studies were made of the preoperative work up (when available) the operative findings and the diagnostic work-up made at the time the patient reported with symptoms A study was then made of the type of medical or surgical therapy used with an evaluation of the benefit of such treatment based upon careful, personal follow up visits. Patients without symptoms have been followed for a period of at least one year This work has been done in the combined medical and surgical Biliary Tract Clinic of the New York Post-Graduate Hospital

Studies of the postcholecystectomy syndrome have been reported by many investigators [1–13] Colp states what is apparently a consensus of opinion that the most common cause of the recurrent symptoms is dyskinesia of the sphincter mechanism with which there may be associated calculi retained cystic duct, common duct stricture, cholangitis, or pancreatitis [1] MacDonald agrees that biliary dyskinesia is prevalent but he believes that inadequate preoperative work-ups and errors in precholecystectomy diagnoses are largely responsible for poor results in surgery [3] All stress the importance of a careful and complete diagnostic work-up, especially before cholecystectomy is performed Most investigators, furthermore, recommend surgery for the postcholecystectomy syndrome only after all possible causes outside the biliary tract have been ruled out, and medical treatment has proved unsuccessful [1 9 14 15] Lahey, however, stresses the danger of delaying operation in the presence of organic obstruction of the biliary tract.[14]

Physiologic disturbances in patients having symptoms both before and after cholecystectomy are primarily concerned with functional disorders of the sphincter of Oddi and abnormal pressure relations in the gallbladder and bile ducts [9 18–26] Before cholecystectomy the normal ductal pressure is about 15 cm of water The maximal pressures of the gallbladder liver, and pancreas are from 20 to 30 cm of water [18 22] As long as these pressure relationships are maintained, the tension of the biliary tract is below the level of consciousness of the patient Under certain conditions the sphincter of Oddi may become irritable, spastic, or hypertrophied In this state it may be able to resist a pressure of 75 cm of water [19] A spasm of the common duct can cause a sudden overdistention of the biliary tract with epigastric pain colic and sometimes nausea and vomiting [9 19 20 24 27,28]

Presented at the 142nd Annual Meeting of the Medical Society of the State of New York New York City Section on Gastroenterology and Proctology May 20 1948.

Experimentally, many investigators have produced pain and colic, both in animals and humans, by overdistention of the gallbladder or bile ducts [8,10,19–23 25,27,28] The same effect of increased intraductal pressure and subsequent pain can be produced, as is shown by manometric readings or by creating a spasm of the common duct sphincter The spasm can result from an injection of morphine, the application of dilute hydrochloric acid to the ampulla, a psychic disturbance on the part of the patient, or by eating irritating foods [8,10 14 20,23 24 26]

Clinical investigations have shown that patients in whom pain was produced experimentally postoperatively had the same types of pain preoperatively, as the result of increased intraductal tension secondary to calculus obstruction or common duct sphincter spasm.[8] Excessive dilatation of the common duct was found to occur in patients having advanced gallbladder disease in a series of autopsy specimens examined by Benson [13] A similar amount of common duct dilatation occurred postoperatively only in those patients having recurrent attacks of pain

Calculus obstruction of the cystic or common duct results in pain, frequently with nausea and vomiting [8] Any other type of obstruction, such as those due to kinks or inflammatory changes or severe common duct sphincter spasm, can produce the same symptoms These are especially apt to occur in patients having an intolerance to fats

Obstruction of the ampulla of Vater, either by stone or spasm, can cause postcholecystectomy symptoms and may result in disease of the liver, biliary ducts, or pancreas [1 4 22 31] Doubilet found that in the gallbladder the regurgitation of the pancreatic ferments changed the normal acid reaction of the bile to alkaline with an activation of the pancreatic ferments by the infected bile and a resultant suppuration or gangrene [22] In surgical patients with cholecystitis, Womack and Haffner found extensive pathologic changes of the gallbladder wall as the result of obstruction, chemical inflammation of highly concentrated bile, and secondary infection.[30] An alteration in the usual bile salt-cholesterol ratio of the gallbladder bile may give changes of this character An excessive proportion of bile salts may give chemical inflammation, with edema, acute cholecystitis, or chronic inflammatory changes of the walls of the ducts or gallbladder An excessive proportion of cholesterol may result in the formation of gallstones or cholesterosis of the gallbladder

An important cause of the postcholecystectomy syndrome is stricture of the common duct [1 2 3 29] This may be traumatic in which there is jaundice sometimes with other symptoms of obstruction With benign fibrous stenosis there are more frequently symptoms of chills, fever, nausea, vomiting, and pruritus The same symptoms may occur with a common duct stone Jaundice occurs in 75 to 90 per cent of this group A retained remnant of a cystic duct may be associated with stones in the remnant of the gallbladder

Jaundice is a problem in differential diagnosis requiring prompt solution Organic extrahepatic obstruction requires early surgical intervention to prevent serious liver damage This type of biliary obstruction is caused by common duct stone, malignancy, pancreatitis, fibrosis, and other stenosing lesions Noncalculus organic obstruction is characterized by the gradual onset of jaundice, the initial absence of severe pain, and a progressive elevation in the serum bilirubin, alkaline phosphatase, and cholesterol Malignancy causes complete common duct obstruction In this case duodenal drainage gives no bile Blood or malignant cells may be found in the duodenal contents and are an aid in differential diagnosis With common duct stones, diagnostic tests indicate intermittent obstruction with, at times, crystalline sediment in the duodenal bile With pancreatitis there is usually an elevation in the amylase of the blood and urine for a few days after the onset of an acute attack

As a means of preventing postcholecystectomy symptoms the presence of symptom-producing stones or an infectious cholecystitis, with or without a concomitant cholangitis, should be promptly recognized and cholecystectomy performed as soon as possible [1 3,8 21 29] It is only in this way that we can prevent progressive pathologic changes While infections of the biliary tract can exist without symptoms, subsequent pathologic changes and ultimate obstructive lesions lead to increased operative mortality and progressive postoperative morbidity [6 12 21,29] Symptoms of recurrent pain, colic, chills, fever, nausea, vomiting, and jaundice are signs of advanced biliary tract disease, infection, or obstruction

The clinical diagnosis of infectious biliary tract disease, however, can be determined only by cultures of duodenal bile [13] As noted by Lyon, this is the only direct evidence of pathology available The accuracy of this method is shown in Table 1, which presents a comparative study of cultures taken from 120 patients Preoperative duodenal bile specimens were taken both before and after stimulation with olive oil, at operation, cultures were made of specimens taken from the gallbladder, the gallbladder wall, the gallstones, the common bile duct, and the cystic duct node if enlarged Of the 75 patients having all cultures of duodenal bile sterile, 74 had sterile cultures from all parts of the biliary tract at operation

Of 32 patients having significant pathogenic organisms in the duodenal drainage bile, 25 showed the same type of organisms in cultures taken from the biliary tract at operation (Table 1)

TABLE 1.—A Comparative Study of Sterile Cultures of Duodenal and Operative Bile in 120 Consecutive Cases

	Number of Patients*	
	Duodenal Drainage	Operative Cultures
Findings of diagnostic value		
Sterile, all cultures	75	74 1 positive
Pathogenic organisms, 1 or 2 types	32*	25 same type 3 different type 4 sterile
Total	107 (89%)	107
Findings not of diagnostic value		
Mixed growth 3 or more types	11	10 sterile 3 positive, different
Nonpathogenic organisms	2	
Total	120	120

* Ninety two per cent of cases showed agreement between duodenal drainage and operative findings

The routine diagnostic investigation of the clinic includes preoperatively a history, physical examination x ray, duodenal drainage, and blood chemistry Following cholecystectomy there are periodic follow up visits with repetition of the duodenal drainages and blood chemistries as indicated In patients coming to operation, an immediate cholangiogram is of great assistance in cases of suspected common duct pathology A delayed cholangiogram is routine in cases of "T" tube drainage before removal of the tube.

In the present group studied there were 295 patients 264 women and 31 men all of whom had had a cholecystectomy The distribution of symptoms is shown in Table 2

TABLE 2.—Distribution of Symptoms in 295 Patients

	Number	Per Cent
No postoperative symptoms		
Calculus	121	
Noncalculus	15	
Total	136	
With postoperative symptoms		
Dyskinesia	70	44
Cholangitis, active	34	21
Injury of common duct	23	14
Noncalculus group	20	13
Cholangitis, inactive	15	9
Retained common duct stone	11	7
Retained cystic duct (3 with stones in duct)	8	5
Benign fibrosis common duct	7	4
Pancreatitis	3	2
Carcinoma ampulla of Vater	1	0 6
Duodenal diverticulum	1	0 6
Total*	150	

* Excluding the 34 active cholangitis cases included in other groups.

Groups without Postoperative Symptoms

Calculus Group (121 Patients 109 Women, 12 Men) —The histories and physical examinations revealed no significant differences from those in patients not relieved of symptoms Cholecystograms were abnormal in showing no visualization, impaired visualization, or stones in all but seven cases The duodenal drainage was abnormal in showing no concentrated gallbladder bile in 68 of 118 drainages Sterile cultures of duodenal bile were accurate indicators of infectious biliary tract disease in most cases, operative cultures were reported sterile in 79 patients and pathogenic in 12 Blood chemistries were normal in practically all cases. The operative diagnoses in this group included ten cases of acute or subacute cholecystitis, seven cases of hepatitis, six cases of hydrops of the gallbladder, three cases of empyema of the gallbladder, and three cases of pancreatitis The diagnosis of chronic appendicitis was made 47 times, with appendectomy in each case.

Noncalculus Group (35 Patients 32 Women, 3 Men) —Following cholecystectomy, 15 patients in this group had no significant symptoms The average age of this group was forty five years. Histories and physical examinations were similar to those patients having calculi The cholecystogram showed normal visualization in ten patients, impaired visualization in five Delayed emptying of the gallbladder was not reported in this group Duodenal drainage findings and blood chemistries did not show significant differences in the two groups One third of these patients had infections of the biliary tract at operation

Groups with Postoperative Symptoms

Noncalculus Group —Twenty of these patients (all women) had symptoms following cholecystectomy The average age of this group was thirty seven years, eight years below that of the group relieved of symptoms. The average interval between operation and the onset of symptoms in 15 of the 20 patients was three months This contrasts with a similar average interval of three years in the calculus dyskinesia group The x ray and drainage findings were similar to those in the group relieved of symptoms, except that delayed emptying of the gallbladder following a fatty meal was reported in four cases Operative findings were similar except for the presence of adhesions noted in 12 cases of this group and in only two cases relieved of symptoms by operation

Dyskinesia Group (70 Patients 64 Women, 6 Men) —The review of the histories in this calculus group before and after operation indicated that only 51 patients had severe pain before operation and 52 had pain after operation. Fol-

lowing operation, the number of patients having right upper quadrant pain was reduced from 32 to 28, the number having epigastric pain, however, increased from 19 to 24

Interesting contrasts in symptoms were noted as shown in Table 3

TABLE 3 —Contrasts in Symptoms of Dyskinesia Group

Symptoms	—Number of Patients— Before Operation	After Operation
Pain		
Right upper quadrant	32	28
Epigastric	19	24
Nausea	32	42
Tenderness right upper quadrant	28	20
Fat intolerance	26	34
Vomiting	22	23
Jaundice	2	4

The average interval between operation and the onset of symptoms in 15 of the 20 patients in whom records were available was three years

Physical examinations were not of diagnostic value X-ray studies showed a high incidence (14 cases) of delayed emptying of the gallbladder, a finding not noted in the group relieved by operation Duodenal drainage in this group showed gastric hyperacidity in ten of 70 cases, the highest incidence of any group studied Another abnormal finding was that, following operation, concentrated bile was found in 49 of 99 drainages (normal postoperative bile is not concentrated) At operation most of these patients had a diagnosis of chronic cholecystitis An appendectomy was done in 13 patients Cultures at operation were sterile in 36 cases, positive in ten

The diagnosis of "reflex dyskinesia" was made in 19 patients Associated diagnoses in other cases were duodenitis, 14, psychoneurosis, three, pregnancy, two, migraine, two, stricture of ureter, two, and arthritis of spine, two

The treatment consisted of a bland diet, sedatives, antispasmodics, antacids when indicated, the relief of constipation, and an attempt to adjust the patient to environmental difficulties The results of treatment were that approximately 40 per cent were considered satisfactorily improved, 32 per cent temporarily relieved of symptoms, and 28 per cent not improved

It is our opinion that in this group the incidence of postcholecystectomy symptoms could have been lowered if the presence of dyskinesia had been recognized before cholecystectomy, and the appropriate therapy instituted promptly after operation

Surgical treatment was not employed for relief of symptoms in this group In general, surgery is considered advisable only after the failure of medical treatment, when there is evidence of recurrent jaundice or liver damage Short circuiting operations have been used with reluctance, preferably in those patients having free hydrochloric acid, to act as a protective mechanism against cholangitis Successful operation requires the maintenance of a large stoma between the bile ducts and intestines for the relief of symptoms Operations to dilate or cut the sphincter of Oddi have not been performed sufficiently often enough to formulate an opinion as to their value

Cholangitis, Active (34 Patients, All Included in Other Groups of Pathology) —This group of patients proved to have pathologic conditions of the biliary tract associated with the persistence of pathogenic organisms in the duodenal bile The diagnoses of those patients having positive cultures at operation were as follows retained common duct stone, 11, benign fibrosis, nine, dyskinesia, four, hepatitis, two, pancreatitis, one, and carcinoma of papilla, one, making a total of 28

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Active cholangitis is a complication associated with biliary tract obstruction Its surgical treatment consists in the relief of the obstruction When infection was known to exist or was suspected by the appearance of the bile ducts or liver at operation, provision was made for adequate prolonged drainage Antibiotics, such as penicillin and streptomycin, while usually ineffective in ridding the ducts of infectious organisms, have been used extensively in both the preoperative and postoperative periods

Common Duct Injury (23 Cases 19 Women, 4 Men) —Most of these patients had had a cholecystectomy elsewhere The diagnosis in this group was determined at the time of re-operation The usual finding was a localized area of stricture with uniform dilatation of the duct above the stricture and an otherwise normal cystic duct except for a biloma proximal to the constriction The onset of symptoms was immediately after operation in 12 cases, the average interval was six months in 20 cases The history of this group showed pain in 17 cases, seven with dull pain and ten with colic The location of the pain was epigastric in seven cases, in the right upper quadrant in eight Jaundice was present in 13, chills and fever in 12, nausea and vomiting in seven, tenderness of the right upper quadrant in eight, fat intolerance in seven Duodenal drainage in this group rarely showed concentrated bile Seven had cultures positive for Escherichia coli Blood chemistry showed an elevation of the serum bilirubin and cholesterol in most cases

Operative diagnoses included, in addition to the diagnosis of common duct stenosis, the follow-

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Table 4 gives a comparative study of the symptoms and physical findings in the dyskinesia group, as compared with the organic common duct obstruction cases (common duct injury and benign fibrous stenosis) It is apparent here that the symptoms of pain and colic, nausea, vomiting, and fat intolerance are more prevalent in the dyskinesia group With organic obstruction on the other hand, the characteristic symptoms were jaundice, chills fever, pruritus, and biliary *fistula*

TABLE 4.—PERCENTAGE OF PATIENTS SHOWING ABNORMAL LABORATORY FINDINGS IN FUNCTIONAL AND ORGANIC OBSTRUCTION OF THE COMMON BILE DUCT FOLLOWING CHOLECYSTECTOMY

	Dyskinesia	Organic Common Duct Obstruction
Number of patients	70	32
Duodenal drainage		
Concentrated bile %	49	86
Cultures		
Sterile, %	87	34
Pathologic, %	13	66
Blood chemistry (elevation)		
Icterus index, %	8	78
Cholesterol, %	15	72
Alkaline phosphatase, %	0	12
Operative cultures		
Sterile %	78	34
Pathogenic %	22	66

Repeated operations were necessary in many patients of this group In some cases five to eight operations had been performed on the same patient before admission to our clinic Operative procedures were based upon the findings in the individual case

Cholangitis Inactive (15 Patients 10 Women 5 Men)—In this group without symptoms repeated duodenal drainages showed the presence in the bile of some pathogenic organisms, 13 had E coli The average age of this group was fifty years five of the patients being over sixty Before operation ten of these patients had tenderness of the right upper quadrant or an enlarged liver All were relieved following operation On duodenal drainage 13 had no free hydrochloric acid in the fasting gastric contents Eleven had highly concentrated bile, indicating probable inflammatory involvement of the sphincter of Oddi

The conclusions relative to this group are that the presence of cholangitis in the absence of obstruction does not produce symptoms. These patients, however, should be carefully followed and treated for any functional disturbances which may produce obstruction

Surgery is not indicated in this group unless the patient is a typhoid carrier A continuation of the typhoid carrier state after cholecystectomy justifies an exploration and a complete removal of the cystic duct if there is any reason to believe that this had not been done adequately at the first operation

Common Duct Stones (11 Patients 10 Women 1 Man)—The histories of these patients are shown in Table 5 Recurrent symptoms began within one year in six cases, the average interval was one month For the remaining five cases, however, average interval before onset of symptoms was twelve years Physical examination revealed jaundice in seven patients, tenderness in the right upper quadrant in five in only one case was the liver palpably enlarged

TABLE 5.—AN ANALYSIS OF SYMPTOMS AND PHYSICAL FINDINGS IN SPASTIC, INTERMITTENT, AND ORGANIC TYPES OF OBSTRUCTION OF THE COMMON BILE DUCT FOLLOWING CHOLECYSTECTOMY

	Dyskinesia	Common Duct Stones	Organic Common Duct Obstruction
Number of patients	70	11	32
Symptoms			
Pain			
Dull	38 (54%)	4	11 (34%)
Colic	30 (51%)	7	12 (37%)
Location			
Right upper quadrant	28	4	12
Epigastrium	24 (34%)	5	6 (18%)
Nausea	42 (60%)	4	10 (31%)
Vomiting	25	5	8
Fat intolerance	34 (48%)	1	7 (21%)
Jaundice	4 (5%)	7	21 (65%)
Chills	13 (18%)	7	14 (43%)
Fever	13	7	14
Pruritus	0	0	10 (33%)
Fistula (bile)	0	0	6 (18%)
Interval between operation and onset of symptoms			
Average time	3 years*	1 month	4 months (29 cases)
Physical examination			
Tender right upper quadrant	18(25%)	5	1 (37%)
Enlarged liver	2 (3%)	1	12 (37%)

Records available in 20 cases

Duodenal drainage in this group showed pathogenic organisms in practically all cases, the predominating organism being E coli Chemical blood examinations indicated in most cases intermittent elevation in the blood cholesterol serum bilirubin, and alkaline phosphatase with positive cephalin flocculation tests in some cases Operative findings in this group included three cases of pancreatitis and six cases of retained remnant of cystic duct. Stones were present in three of the dilated gallbladder remnants. Cultures at operation were positive in eight cases six of these were E. coli

lowing operation, the number of patients having right upper quadrant pain was reduced from 32 to 28, the number having epigastric pain, however, increased from 19 to 24

Interesting contrasts in symptoms were noted as shown in Table 3

TABLE 3.—CONTRASTS IN SYMPTOMS OF DYSKINESIA GROUP

Symptoms	Number of Patients—Before Operation	After Operation
Pain		
Right upper quadrant	32	28
Epigastric	19	24
Nausea	32	42
Tenderness right upper quadrant	28	20
Fat intolerance	26	34
Vomiting	22	23
Jaundice	2	4

The average interval between operation and the onset of symptoms in 15 of the 20 patients in whom records were available was three years

Physical examinations were not of diagnostic value X-ray studies showed a high incidence (14 cases) of delayed emptying of the gallbladder, a finding not noted in the group relieved by operation Duodenal drainage in this group showed gastric hyperacidity in ten of 70 cases, the highest incidence of any group studied Another abnormal finding was that, following operation, concentrated bile was found in 49 of 99 drainages (normal postoperative bile is not concentrated) At operation most of these patients had a diagnosis of chronic cholecystitis An appendectomy was done in 13 patients Cultures at operation were sterile in 36 cases, positive in ten

The diagnosis of "reflex dyskinesia" was made in 19 patients Associated diagnoses in other cases were duodenitis, 14, psychoneurosis, three, pregnancy, two, migraine, two, stricture of ureter, two, and arthritis of spine, two

The treatment consisted of a bland diet, sedatives, antispasmodics, antacids when indicated, the relief of constipation, and an attempt to adjust the patient to environmental difficulties The results of treatment were that approximately 40 per cent were considered satisfactorily improved, 32 per cent temporarily relieved of symptoms, and 28 per cent not improved

It is our opinion that in this group the incidence of postcholecystectomy symptoms could have been lowered if the presence of dyskinesia had been recognized before cholecystectomy, and the appropriate therapy instituted promptly after operation

Surgical treatment was not employed for relief of symptoms in this group In general, surgery is considered advisable only after the failure of medical treatment, when there is evidence of recurrent jaundice or liver damage Short circuiting operations have been used with reluctance, preferably in those patients having free hydrochloric acid, to act as a protective mechanism against cholangitis Successful operation requires the maintenance of a large stoma between the bile ducts and intestines for the relief of symptoms Operations to dilate or cut the sphincter of Oddi have not been performed sufficiently often enough to formulate an opinion as to their value

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Pruritus	0	0	10 (23%)
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Interval between operation and onset of symptoms			
Average time	3 years*	1 month	4 months (29 cases)
Physical examination			
Tender right upper quadrant	18(25%)	5	12(37%)
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Records available in 70 cases.

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Most stones found in the common duct were faceted or laminated in appearance, suggesting that they had originated in the gallbladder, been extruded into the common bile duct, and overlooked at the time of cholecystectomy Another type is the dark, amorphous or crystalline, calcium bilirubinate stone This type of stone, however, is more likely to have been formed after cholecystectomy When removed, it may reform Some patients have required as many as eight operations for recurrent stones of this character Occasionally, a short circuiting operation is necessary to relieve biliary stasis

Retained Cystic Duct Remnant (8 Cases 5 Women, 3 Men)—The history of this group revealed colic in five cases, location epigastric in four Jaundice, chills, and fever occurred in seven cases, nausea and vomiting in six The average interval between operation and the onset of symptoms in two cases was five and one-half months, in the remaining six cases the average interval was fourteen years Physical examination showed a tender liver in six cases The blood chemistry in this group showed an elevation of the serum bilirubin in five cases, and the cholesterol was elevated in three cases

Operative findings revealed stones in the gallbladder remnants in three cases, stones in the common duct in five cases Hepatitis was noted in three patients, pancreatitis in two Cultures at operation were of interest in that all eight cases had positive cultures, six of these showed two organisms—one was usually E coli At operation the gallbladder remnants were of two types

1 A portion of the gallbladder left because of high amputation Stones present were probably overlooked at the first operation, since all patients in whom stones were found had stones at the time of cholecystectomy

2 A dilated remnant of the gallbladder, consisting of the cystic duct and a portion of the ampulla of gallbladder, with a dilatation of the common bile duct Regeneration of the gallbladder is probably the best designation of this condition.

Treatment in the former group consisted in the removal of the remnant and stones In the latter group the obstructive lesion of the common duct was of far more importance than the gallbladder remnant The treatment was dependent upon the cause of the common duct obstruction

Benign Fibrous Stenosis (9 Cases)—The nine patients of this group showed at operation a diffuse fibrotic thickening of the common or hepatic bile ducts, as differentiated from the localized constriction and proximal dilatation of the common duct found following definite injury Colic in this group was rare, jaundice being the outstanding symptom Pruritus occurred in four patients On physical examination six of the nine patients had an enlarged, tender liver The average onset of symptoms after operation was two months, most cases occurring promptly The blood chemistry was an important diagnostic finding, all patients showed a definite elevation in blood cholesterol and serum bilirubin (Table 4)

Operative procedures in this group were varied Short circuiting procedures were favored For intrahepatic duct lesions, dilatation and prolonged drainage by "T" tube was used, the superior fork of the tube extending through the strictured area

Little is known about the underlying cause of this type of fibrosis The onset may be acute During this phase the bile ducts appear to be acutely inflamed and the mucous membrane lining the ducts hemorrhagic in appearance The surrounding lymph glands are enlarged and inflamed All of the structures of the gastrohepatic ligament appear to be undergoing an inflammatory reaction to a powerful agent Culture studies for bacteria in the early stages have not been conclusive

The stage of fibrosis may be complicated by stricture, perforation, and subsequent obstruction to bile flow The lesion may be regional, being found in any part of the intra- or extrahepatic ducts In many respects this regional choledochitis resembles regional ileitis

Pancreatitis (3 Cases 2 Women, 1 Man)—In three patients pancreatitis was found to be responsible for postoperative symptoms A man of sixty-six years was found to have pancreatitis at the time of a re-operation for stones In one case there was found fat necrosis, in another an enlarged liver In two women the diagnosis of pancreatitis had been made at the time of a cholecystectomy Two of the patients had cultures of E coli from the biliary tract at operation, cultures from the third were sterile Two patients were considered cured following operation The third with a duodenal diverticulum and a persistent colon infection in the biliary tract continued to have symptoms over a period of six years observation

Surgical treatment of pancreatitis by "T" tube drainage of the common bile duct is indicated after cholecystectomy as it was before or at the time of the primary operation Removal of the associated obstructive factor, stones when found, followed by prolonged drainage suffices, and recurrences of pancreatitis are infrequent Diagnosis of the obstructing factors present by means of the cholangiogram is becoming more accurate When obstructing factors that cannot be corrected directly are encountered, an operation to short circuit the flow of bile around the obstruction to the intestine has been chosen

Summary

1 Symptoms of biliary tract disease before and after cholecystectomy are due to pathologic disturbances resulting from conditions which may be inflammatory, metabolic, mechanical, or functional in origin.

2 The presence of functional disorders, with or without organic disease should be determined before cholecystectomy

3 The incidence of postcholecystectomy syndrome can be lowered by the use of a comprehensive diagnostic investigation before cholecystectomy

4. In patients having symptoms after cholecystectomy, a similar diagnostic work-up is of value in determining the cause of symptoms and in indicating specific treatment.

5 In functional disturbances medical therapy is indicated. When functional disorders are concomitant with organic disease, this diagnosis should be established before cholecystectomy Medical therapy should be instituted promptly after operation

6 Surgery is indicated for calculus, infectious, and obstructive disease of the biliary tract.

7 The usual findings in patients who require surgery are

(a) Pain (especially recurrent), jaundice, nausea, vomiting, chills, fever, and occasionally pruritus

(b) Physical findings of tenderness in the right upper quadrant, sometimes with an enlarged liver

(c) Duodenal drainage findings of pathogenic organisms in the bile

(d) Blood chemistry Elevation in serum bilirubin alkaline phosphatase, and cholesterol

References

1 Colp Ralph Bull. New York Acad. Med. 20:203 (Apr.) 1944.
2. Myers, S. G., Sandweiss D. J. and Saltzstein H. C. Am. J Digest. Dis. 5: 607 (1938)
3 MacDonald, D.: Am. J Surg. 62: 19 (1943)
4 Carter R. F., and Marraffino, B. L.: New York State J Med 40: 1648 (1940)
5 Wilson, W. D Lehman, E. P and Goodwin W. A.: J A M.A. 106: 2209 (June 27) 1936.
6. Carter R. F Greene C. H. and Twiss, J. R.: The Diagnosis and Management of Diseases of the Biliary Tract, Philadelphia, Lea & Febiger 1939
7 Elman R.: Surg. Clin. North America 20 1247 (1940)
8. Zollinger R.: J.A.M.A. 105: 1047 (1935)
9 Puestow C. B.: Surg. Gynec. & Obst. 67: 82 (1938)
10 Best, R. R. and Barr J H.: Ann Surg. 117: 207 (1943)
11 Hare H. F., and Cattell, R. B.: Surg. Clin. North America (June) 1944
12 Hicken, N. F White, L. B. and Coray Q B Surgery 21:300 (May) 1947
13 Benson R. W.: Am. J Digest. Dis. 7: 1 (1940)
14 Lahey F H. and Jordan, S. M. Am. J Surg. 11 1 (1931)
15 Jordan, S. M Surg Clin. North America (June) 1943
16 Ivy A C Physiol. Rev 14 1 (1934)
17. Ivy A. C. and Sandblom, P Ann. Int. Med 8 115 (1934)
18. Ivy A. C. and Goldman, L. J A.M A. 113: 413 (1939)
19 Best, R. R. and Hicken, N F Surg. Gynec. & Obst. 61: 731 (1935)
20 Butsch, W. C., McGowan, J M and Walters W Surg., Gynec. & Obst. 63: 451 (1936)
21. Snell, A. M., McGowan, J M and Butsch W L. Rhode Island M J 19: 113 (1936)
22. Mirizzi P L.: Surg., Gynec. & Obst. 74: 306 (1942)
23 Doubilet, H. and Colp R. Surg Gynec. & Obst. 64: 622 (1937)
24 McGowan, J M. Butsch, W L. and Walters, W.: J A.M.A. 106 2227 (1936)
25. Bergh, G S. and Layne J A. Am. J Physiol. 128 690 (1939-1940)
26. Bergh, G S.: Surgery 11: 290 (1943)
27 Ivy, A C. Voegtlin, W R., and Greengard, H. J.A.M.A. 100 1310 (1933)
28. Judd, E S. and Mann, F C.: Surg. Gynec. & Obst. 24: 437 (1917)
29 Russell, T H. Carter R. F., and Oppenheim E.: Bull New York Acad. Med. 19 77 (Feb.) 1943.
30. Womack, N A. and Haffner H.: Ann Surg. 119 391 (1944)
31. Reinhoff W F and Pickrell, K. L.: Arch. Surg. 51: 295 (Nov.) 1945.
32. Twiss, J R., and Phillips, C. H.: Am. J Digest. Dis. & Nutrition 2: 653 (1935)

MIGRAINE HEADACHE RELIEF POSSIBLE WITH HISTAMINE

Relief for migraine headache sufferers is possible with the body chemical believed involved in allergy histamine, according to two Mayo Clinic physicians, Dorothy Macy, Jr., and Bayard T Horton.

Their description of the treatment of 144 patients with migraine headache at this clinic from 1937 to 1946 appears in the *Journal of the American Medical Association* for July 24.

While 98 of these patients showed a 25 to 100 per cent improvement, they emphasize that histamine is not a cure for the condition.

Drs. Macy and Horton stated that freedom from migraine attacks in these patients paralleled the period of treatment with histamine. They declared that patients who were free of symptoms after one year or more were still taking histamine once daily or every other day —*Science News Letter August 7 1948*

ACUTE PANCREATITIS

H L Bockus, M D , and Edward C Raffensperger, M D , Philadelphia, Pennsylvania

(*From the Graduate Hospital of the University of Pennsylvania*)

A GOOD concept of the pathologic characteristics of acute catastrophic inflammation of the pancreas may be gleaned from the first comprehensive description of acute pancreatitis given by Fitz in 1889 [1–3] At present the severe form of acute pancreatitis associated with necrosis of the pancreas and surrounding tissues is usually designated acute necrosis of the pancreas Neither hemorrhage nor suppuration accompanies the inflammation in every instance One or the other, or both, may be present in varying degrees The necrotic lesion is due to the liberation of pancreatic enzymes, giving rise to the white opaque areas of so-called fat necrosis, described by Balser in 1882 [4]

As a result of observations at necropsy and operation, together with the accrued experience of many observers with pancreatic serum enzyme determinations, many instances of less severe acute inflammation of the pancreas with little or no necrosis have been recognized and described [5–7] This milder type of inflammation has been termed edema of the pancreas, subacute pancreatitis, acute transient pancreatitis, or interstitial pancreatitis As compared with acute necrosis of the pancreas, usually in so-called edema of the pancreas, the clinical symptoms and signs are milder, serum enzyme values are lower, and perhaps there is a lessened likelihood of occurrence of delayed hypocalcemia Acute edema of the pancreas has been recognized most often in association with acute episodes of biliary tract disease In fact, it has become customary to consider acute edema of the pancreas as being commonly due to acute episodes of biliary tract disease It should be borne in mind, however, that any mechanism which is capable of causing acute necrosis may at times cause only edema of the pancreas without concomitant necrosis Perhaps the only tenable concept concerning the pathogenesis of acute pancreatitis is that all grades of acute inflammation of the pancreas, with or without massive necrosis, are but manifestations of the same basic process, merely representing varying degrees of inflammatory response to the insulting agent Various factors undoubtedly enter into the degree of response which occurs They must include the following (1) the modus operandi of the inciting cause or causes, (2) the presence or absence of obstruction to the outflow of pancreatic juice, (3) the presence or absence of antecedent pancreatic inflammation, (4) the degree of escape of pancreatic enzymes into the surrounding tissues, and (5) the presence or absence of a disturbance of the blood supply to the pancreas In the early stages of an attack it is not possible to prognosticate with certainty whether the inflammation will be characterized by edema alone with little or no necrosis or whether extensive necrosis will take place

It is only during the last decade that the early diagnosis of acute pancreatitis has become a frequent achievement, and that a procedural pattern for therapy has been established Our interest in acute inflammation of the pancreas has been renewed recently as a result of a review of patients encountered on the gastrointestinal service at the Graduate Hospital during a fourteen-month period extending from March, 1946, to May, 1947 During this time, ten patients with the disease were studied A review of data derived from this case study serves to emphasize the lack of ability to make a clinical diagnosis at the bedside and the efficacy of certain laboratory procedures in differential diagnosis A plan of therapy based on a knowledge of the physiology of the pancreas has yielded excellent results Six detailed case reports will be found at the end of the article * The other four cases are not reported in detail here since clinical observation and operation indicated that the patients had had an underlying chronic interstitial pancreatitis They were admitted and studied during an episode of superimposed acute inflammation of the pancreas No effort is made to review completely all of the various features of acute pancreatitis We wish to stress the importance of certain laboratory procedures in differential diagnosis and the efficiency of conservative medical management during the acute fulminant stage of the disease

Etiologic Features

The present status of knowledge of the cause and pathogenesis of acute pancreatitis has been given elsewhere [8] No effort is made to elaborate upon these features at this time Two etiologic factors have been of great importance in our patients They are a history of the excessive im-

Presented by invitation, at the 142nd Annual Meeting of the Medical Society of the State of New York, New York City Section on Gastroenterology and Proctology May 20, 1948

* Due to lack of space the individual case reports cannot be included with this paper but may be found in the authors reprints

bibing in alcohol and the presence of biliary tract disease A history of the excessive use of alcohol was obtained in four patients (40 per cent) in whom no evidence of biliary tract disease could be found In an additional patient both alcoholic excesses and gallbladder disease were noted Thus, in 50 per cent of our patients a history of excessive use of alcohol was obtained In three of these the acute attack responsible for the patient's admission followed excessive drinking Although the prevalence of pancreatic disease among chronic alcoholics has been noted, too little attention has been given to the relative frequency of attacks of acute pancreatitis following bouts of excessive drinking [9 10]

It has been stated that in 60 to 80 per cent of cases of acute pancreatitis biliary tract disease has been considered to have etiologic importance [11] Biliary tract disease was present and probably accounted for the pancreatic insult in five of these patients. In one an addiction to alcohol was also found. It is of interest that obstructive jaundice was a feature of the illness in four patients The preoperative diagnosis of acute pancreatitis in each instance was made only by the finding of an increased concentration of the pancreatic serum enzymes It is of great practical importance to keep in mind the possibility of insult to the pancreas during the course of acute biliary tract inflammation, particularly if associated with jaundice. If pancreatic serum enzyme determinations are not routinely performed in all patients with biliary colic, certainly these tests should be carried out under the following circumstances (1) pain of greater severity than one usually encounters in association with biliary colic, (2) radiation of pain to the left epigastrium and/or to the region of the left scapula, (3) the presence of marked muscle guarding bordering on rigidity, (4) a greater degree of constitutional reaction than one usually finds in biliary colic—higher fever markedly increased pulse rate and marked leukocytosis (5) the association of mild shock or vascular skin changes which occur at times in association with acute pancreatitis and (6) a lack of relief of pain following hypodermic injection of opiates It is essential to keep this association in mind since it is unwise to operate in the presence of acute severe inflammation of the pancreas if it can be avoided A pancreatic rest regimen should be instituted at once and the patient carefully watched

It is of interest that in this series only one patient was encountered with acute pancreatitis who did not use alcohol to excess or who did not have evidence of biliary tract disease.

Clinical Features

Almost all experienced clinicians freely admit that acute pancreatitis follows no consistent symptom pattern The location of the initial pain is frequently not characteristic, although commonly it is experienced in the epigastrium. Not infrequently the initial pain may be in the lower abdomen in the lumbar region, beneath the sternum or in the left chest The character of the pain is not consistent, often it is sharply intense and constant, but not rarely it may be dull and at times somewhat intermittent The more usual epigastric pain may radiate to the left and to the area of the first or second lumbar vertebra However, radiation may take place in almost any direction.

Acute pancreatitis masquerades in many different guises One of the most dramatic is an onset simulating that of other acute abdominal emergencies like that of free perforation of peptic ulcer or ruptured viscus Oftentimes, as compared with perforated viscus, the abdominal wall in acute pancreatitis is less rigid and one is less likely to encounter the so-called 'silent abdomen" The pain in pancreatitis is often of lesser severity than the initial pain of perforated peptic ulcer and radiation to the tip of the shoulder is less common However in acute catastrophic inflammation of the pancreas the shocklike state is often more intense and more lasting

The shocklike state may attract greatest attention in some patients This in combination with high epigastric substernal or high back pain, may cause one to suspect an acute coronary occlusion The shocklike state in acute pancreatitis may cause consideration to be given to other vascular accidents particularly acute mesenteric occlusion More than an ordinary suspicion of an acute pancreatitis should be aroused if the curious skin changes happen to appear These include a peculiar cyanosis or patches of slate-blue color distributed over the abdomen and limbs and a queer brownish discoloration appearing below the ribs posteriorly or petechial patches, particularly in the region of the buttocks. A queer mottling of the skin of the limbs has also been described These signs are not commonly present but if they do exist in a patient suspected of having acute pancreatitis, they may add some support to that diagnosis

Acute pancreatitis occasionally mimics small bowel obstruction because of the tendency for small intestinal adynamic ileus to occur in some of the more ill patients. In one of our patients intestinal obstruction was given serious consideration on admission. One could go on mentioning many other conditions which are mimicked by acute inflammation of the pancreas. In the cases which we have reviewed, some consideration was given to the diagnosis of acute alcoholic gastritis, acute appendicitis, and acute pneumonitis It

should be borne in mind that, even in association with acute severe necrosis of the pancreas, the symptoms may be very mild and go unrecognized This is particularly true in pancreatitis occurring in association with biliary colic

The difficulties in arriving at a diagnosis based on clinical bedside methods will become obvious to the reader by perusal of the case reports We should like to draw attention to the bizarre clinical picture presented by case J R His family physician gave primary attention to the possibility of coronary occlusion Upon arrival in the hospital, the physical examination revealed suggestive signs of a pneumonitis at the left base, which was confirmed by roentgen studies At this time the abdominal signs were minimal Some hours later, one of us found exquisite tenderness in the lower right abdominal quadrant, sufficient to arouse a suspicion of the presence of acute appendicitis Somewhat later, tenderness was also found in the lower left abdominal quadrant, and some thought was given to a primary acute diverticulitis The diagnosis became clear only with the arrival of the report on the serum amylase concentration, which was 1,068 mg

Another patient illustrating the difficulties of bedside diagnosis was H F When he arrived in the admission ward, the house officer gave serious consideration to a volvulus of the sigmoid with complete intestinal obstruction because of the degree of abdominal distention which seemed more marked in the lower left abdominal quadrant

As a result of our recent experiences we are prepared to state unequivocally that a bedside diagnosis of acute pancreatitis is rarely, if ever, possible.

Blood Serum Enzyme Tests

Fortunately, we have in the serum enzyme tests a means of establishing the diagnosis of acute inflammation of the pancreas These tests have great value in the differential diagnosis of the so-called "abdominal emergencies" We have not encountered an instance of acute necrosis of the pancreas in which a marked hyperenzymemia has not been found during the first three days of the illness It should be stated, however, that one cannot with certainty exclude the presence of some degree of inflammation of the pancreas by obtaining negative blood serum enzyme tests We have recently studied a patient with chronic relapsing pancreatitis in whom, during the course of an acute episode of abdominal pain, undoubtedly of pancreatic origin, there was no increase in the concentration of pancreatic enzymes in the blood Obviously, if the parenchyma of the pancreas has been destroyed by long-continued inflammation, then the manufacture of enzymes ceases, and one cannot expect to obtain evidence of hyperenzymemia Usually, even in patients with chronic interstitial pancreatitis, the blood serum enzymes are elevated during the course of an acute attack

We employ for determination of the serum amylase the saccharogenic method of Somogyi [12] The normal values by this method in our laboratory range between 60 and 140 mg For determining the concentration of serum lipase we use the Loerenhart method, modified by Cherry and Crandall, previously described [13,14] Normal values by this method in our hands do not exceed 1 0 cc

The amylase test has proved of greatest value in the diagnosis of acute pancreatitis for two reasons The determinations can be carried out within one hour, whereas the lipase test requires twenty-four hours In acute inflammation of the pancreas the rise in blood serum amylase occurs earlier It may be noted that the initial serum amylase concentration was abnormally high in all of the six cases reported in detail (Figs 1–6) In two of these patients the first determination for lipase was normal

The lipase determination has greatest value after the first forty-eight hours of the illness, and the concentration of serum lipase remains greater for a longer period of time than that of serum amylase Amylase is excreted from the body in most instances quite rapidly Evidently, the elimination of lipase from the body lags considerably behind that of amylase For these reasons it is advisable to test the serum for both enzymes when the presence of acute pancreatitis is suspected Figure 7 is a composite curve of the concentrations of serum amylase and lipase during the course of acute pancreatitis in eight patients

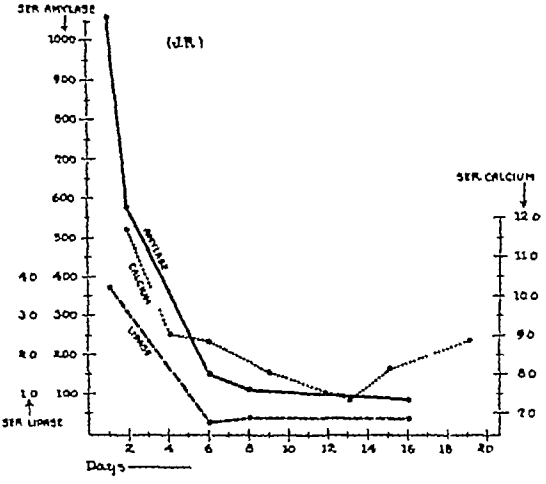


FIG 1 Behavior of pancreatic enzyme and calcium concentrations of the blood during the first attack of acute pancreatitis in case J R.

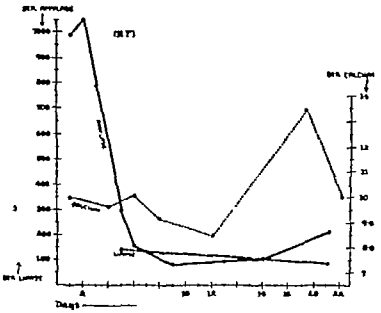


FIG 2. Curves of pancreatic enzymes and calcium values of the blood in very severe acute pancreatic necrosis in case H F

The frequent employment of serum enzyme tests is essential whenever the possibility of acute pancreatitis is under consideration. We employ these tests routinely in all patients suspected of fitting into any of the following categories (1) acute cholecystitis, (2) severe biliary colic (3) all patients with acute severe abdominal pain of undetermined origin, particularly those giving a history of excessive imbibing in alcohol or previous attacks attributed to biliary tract disease, (4) patients admitted with severe injury to the abdomen, and (5) patients admitted in a shocklike state. The frequent use of these tests probably accounts for the appreciable increase in the incidence of diagnosis of acute pancreatitis in the wards of the Graduate Hospital We should like to give a word of warning in the interpretation

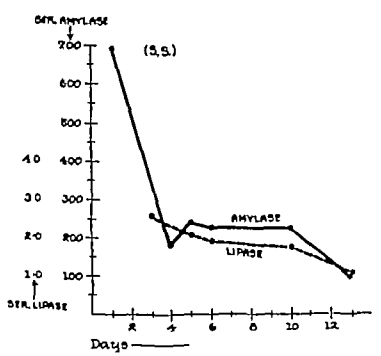


FIG 3 The curve of serum enzyme values in case S. S. The brief duration of the attack and the absence of striking constitutional signs suggest a lesser degree of inflammation than in cases J R. and H. F

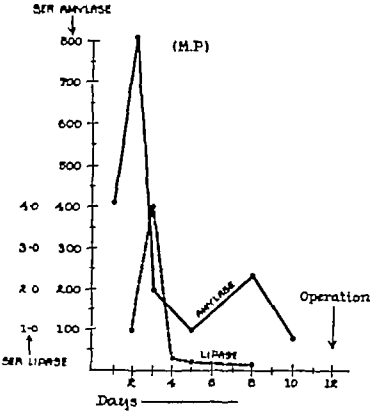


FIG 4 Chart of serum enzyme values in case M P, an example of acute pancreatitis occurring in association with biliary colic and jaundice.

of hyperenzymemia which is only moderate One of us (E. C R.) is accumulating data that suggest the occurrence of a moderate increase in the serum enzymes in other acute abdominal conditions not originating in the pancreas. At present, we look upon all patients showing increases in the concentration of serum amylase beyond five times the average normal values (500 mg or greater) as highly suggestive, if not indicative, of primary acute inflammation of the pancreas Values for amylase below five times the normal concentrations may possibly be the result of acute abdominal processes not originating in the pancreas

Blood Calcium Values

In acute pancreatitis white opaque areas of so-called fat necrosis are commonly seen on the surface of the pancreas and in the mesentery, omentum and parietal and visceral peritoneum These areas of fat necrosis' have been attributed

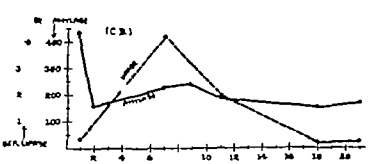


FIG 5 Case C. B is probably an example of acute edema of the pancreas in association with acute gastritis. Note the lag in the elevation of the blood serum lipase and the abrupt drop in the amylase value.

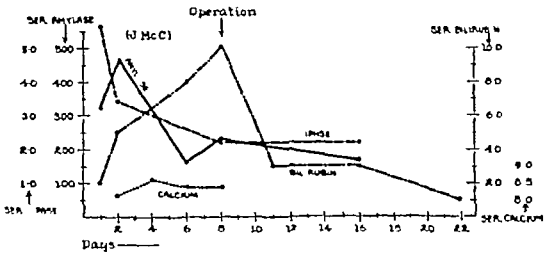


FIG 6 Serum enzyme, calcium and bilirubin values during the course of an attack of severe upper abdominal pain and jaundice Evidently an example of acute pancreatitis superimposed on chronic interstitial pancreatitis (J M)

to the action of pancreatic enzymes, which hydrolyze fat into glycerin and fatty acids, the latter then combine with calcium to form calcium soaps Recently, Edmondson and Berne have drawn attention to the marked mobilization of calcium in and around the pancreas as a result of the formation of calcium soaps [15] This shift in body calcium frequently resulted in a decreased concentration of calcium in the blood serum The latter concentration was below 9 mg per 100 cc of blood in 36 of 50 cases of pancreatic necrosis between the second and fifteenth day of the disease [15] According to these observers concentration of serum calcium below 7 mg entailed a fatal prognosis The lowest figure for the serum calcium in their series of patients was obtained on the sixth day of the disease

In four of our patients (40 per cent) the serum calcium values were reduced In two of them hypocalcemia was sufficiently marked to cause us to administer calcium intravenously The lowest serum calcium value in our patients was 7 4 mg per cent It is of interest that the patients who were most seriously ill were those in whom the lowest values for serum calcium were obtained Our series is too small to permit of com-

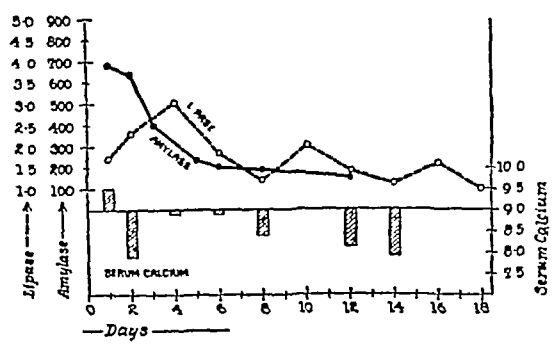


FIG 7 Composite curve of concentrations of serum amylase and lipase during the course of acute pancreatitis in eight patients The average mean blood calcium values in four cases are also shown The low calcium value in one patient on the second day probably represents a laboratory error

ment on the relative importance of hypocalcemia in prognosis in acute pancreatic disease By consulting Fig 7 it will be noted that the greatest depression in serum calcium concentration in these four patients occurred on the fourteenth day One determination in one patient on the second day of the disease showing a marked hypocalcemia is probably a laboratory error It will be noted that the serum calcium determination has little value in the early diagnosis of acute necrosis of the pancreas It is probable that marked hypocalcemia appearing on the fourth day or later adds support to the diagnosis of acute necrosis rather than that of a lesser degree of inflammation, as in so-called acute edema of the pancreas

Electrocardiographic Changes

Not infrequently, in the differential diagnosis of acute pancreatitis, coronary occlusion must be excluded One must also consider the concomitant occurrence of cardiac insult because of the associated shock and at times of a marked disturbance in electrolyte balance due to vomiting, dehydration, etc Obviously, these changes would be most marked in patients with antecedent cardiovascular disease In five patients with acute pancreatitis, Gottesman and his associates have recently reported the occurrence of electrocardiographic changes simulating those of coronary thrombosis [16,17] The abnormalities in the tracings were present when the patients were acutely ill and when the serum amylase was elevated With improvement in the clinical status of the patient and a return of the serum amylase concentration to normal, the electrocardiographic changes disappeared In their patients there was depression of the S-T segment in leads 2 and 3, and diphasic T waves were noted in leads 1, 2, and 3 Six days later, the T wave in lead 1 was inverted, and the T wave of lead 2 was diphasic, whereas fourteen days after the onset of the acute pancreatitis the tracings were normal

In three of our patients with acute pancreatitis, electrocardiographic changes were noted In case C B , four days after admission, the heart rate was 84, and PR interval 0 14 second The rhythm, P waves, and QRS complexes were normal The RS-T segments were iso-electric, the T waves were low in amplitude in L_2, CR_3, CR_4, and CR_5 and were inverted in CR_2 (Fig 8) This tracing was interpreted by our cardiologist, Doctor Samuel Bellet, as showing evidence of myocardial abnormality The electrocardiographic tracings, recorded four, seven, and eight days after the first tracing, were considered to be normal

In patient S S , two days following the acute attack, the electrocardiographic tracing revealed a rate of 75, PR interval of 0 19 second Rhythm

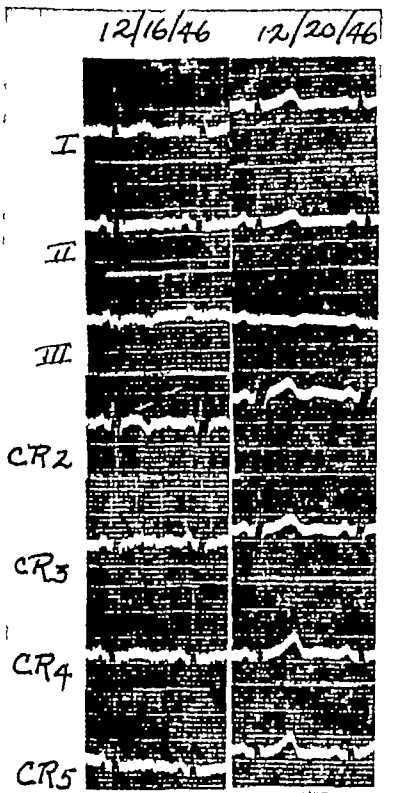


FIG 8. The tracing of C. B on December 12, 1946 showing evidence of myocardial abnormality was made three days after admission (see Fig. 5 for enzyme values) Four days later the tracing was essentially normal.

P waves, and QRS complexes were normal RST complexes were elevated in CR_3, CR_4 CR_5, low T waves in L_2 and L_3 and inverted T waves in L_1 CR_1, CR_2, and CR_5. These findings were interpreted as being indicative of advanced myocardial disease and suggestive of coronary artery involvement with possible recent myocardial infarction An electrocardiogram four days later showed normal RS-T complexes in all leads, low and upright T waves in L_1 L_2 L_3 CR_4, and CR_5.

Twenty two serial electrocardiographic tracings were performed on H F during the course of

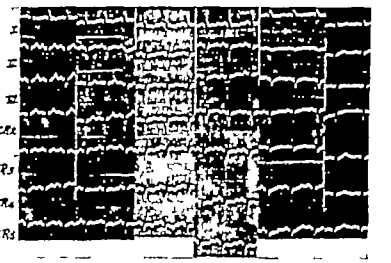


FIG 9 Acute severe pancreatic necrosis in case 11 F At the time of first tracing patient was in shock with a serum amylase value of 989 mg (Fig 2) Acute lateral coronary infarction was suspected. The abnormal findings improved but did not entirely disappear

eight weeks observation (Fig 9) In general, the interpretation of the tracings was that of acute lateral myocardial infarction The abnormal findings improved but did not completely disappear during this period It should be noted that the patient was extremely ill, being comatose for one week. Diabetes mellitus occurred during the course of the illness

As a result of the study of the electrocardiographic tracings in these three and in several other patients observed by Doctor Bellet, he has expressed the following opinion

'Profound changes occur in the electrocardiographic tracings in many patients with acute pancreatitis They include inversion of the T waves in lead 1 in the other limb leads, and in the precordial leads, accompanied by varying degrees of depression of the S-T segment These changes gradually return to normal with improvement in the clinical state of the patient These findings in conjunction with the clinical picture might be confused with the findings of acute myocardial infarction."

He expressed the opinion that the electrocardiographic changes in acute pancreatitis are to some extent the result of the shocklike state, particularly in older individuals with coronary arteriosclerosis. He likewise has considered the possible effect of a diminution in the concentration of serum potassium He believes that decreased serum potassium values could occur in association with acute pancreatitis particularly if vomiting or dehydration has accompanied the illness and if the patient is treated with large amounts of parenteral fluid and/or Wangensteen drainage.[18] He also mentioned that the loss of serum potassium may be increased in patients with concomitant diabetes mellitus since the administration of in-

sulin and glucose may still further diminish the concentration of serum potassium

We are of the opinion that the causes of the electrocardiographic changes occurring in association with acute pancreatitis have not been clearly established, but certainly the factors mentioned by Bellet should be given serious consideration We have presented the electrocardiographic examinations of these patients in some detail in order to emphasize the possibility of arriving at an erroneous diagnosis of acute coronary occlusion in patients with acute pancreatitis This mistake is not likely to occur if serum enzyme determinations are performed Unfortunately, coronary occlusion may occur in association with pancreatic necrosis, rendering the complete diagnosis very difficult

Treatment

Formerly, immediate operation was frequently employed in the treatment of acute pancreatic necrosis The mortality following immediate operation is something more than 50 per cent [19–21] In 1927 Schmieden and Sebening culled from the literature a total of 1,278 cases of acute pancreatitis treated by operation, resulting in a mortality of 51 2 per cent DeTakats and MacKenzie were apparently the first observers to question seriously the concept that acute pancreatitis was a surgical emergency [22] They observed that only eight of 22 patients with acute pancreatitis who were not operated on within the first twenty-four hours died (a mortality of 36 6 per cent) In 1934 Mikkelson reported 39 instances of acute pancreatitis, 20 of those patients were acutely ill and were treated conservatively in the acute stage of the disease [23] The mortality in this group was only 7 5 per cent It is now generally agreed that immediate operation is unwise, providing other acute "abdominal emergencies" can be excluded It is thought best to withhold operation during the acute stage of pancreatitis unless it becomes complicated by suppuration, severe hemorrhage, or spreading peritonitis After convalescence from the acute attack, if a severe complication has not developed, definitive biliary tract surgery is required in many patients Obviously, because of the peculiar physiologic activity of the pancreas, the need for a plan of medical treatment destined to curtail excessive pancreatic function is required Rowland devised such a plan [24] An outline of the principles of treatment employed in our patients follows

1 Relief of Pain—Aside from the unpleasantness of pain, it must be looked upon as definitely deleterious to the organism and certainly to the myocardium It has been pointed out by Popper and others that morphine should not be used because of its possible vagotonic action At any rate, in our experience it is a frequent cause of nausea and vomiting Demerol evidently has an atropine-like action and may be looked upon as the analgesic of choice Phenobarbital may likewise be given as needed Paravertebral block on the left side at the level of the eighth to tenth thoracic spinal processes has been used in several patients by Popper with good results We have had no experience with this method in acute pancreatitis but have employed it in the management of intractable pain in chronic relapsing pancreatitis

2 Treatment of Shock and Dehydration—Every effort should be made to overcome shock as quickly as possible by the administration of plasma and blood transfusions as required Because of the complete fasting which is recommended for these patients, sufficient parenteral fluid is required to maintain normal renal function and good electrolyte balance A word of caution is needed in the administration of glucose and insulin Diabetes mellitus accompanies acute pancreatic necrosis occasionally Glucose infusion must be given cautiously with frequent blood sugar determinations With the occurrence of hyperglycemia sufficient insulin is required with each glucose infusion Usually 5 to 10 units of regular insulin are given subcutaneously with each 25 Gm of glucose intravenously Even of greater importance is the necessity for avoiding insulin shock and hypoglycemia. The vagotonic action of hypoglycemia on pancreatic secretion may prove deleterious We have usually employed either 2 5 or 5 per cent glucose solutions, slowly infused, and have avoided the use of solutions of greater concentration.

3 Measures Adopted to Avoid Hormonal Stimulation of the Pancreas—When acute pancreatitis is suspected, a nasal tube should be introduced into the stomach at once and constant Wangensteen suction begun Care must be taken to maintain the position of the tube proximal to the pylorus in order to avoid the passage of gastric juice containing hydrochloric acid into the duodenum We have been in the habit of administering either soluble or insoluble alkalis every one or two hours during the period of Wangensteen suction If these measures are carried out meticulously, it is likely that the hormonal phase of pancreatic secretion may be suppressed

4 Measures to Avoid Nervous Stimulation of the Pancreas—Atropine sulfate in the dose of $1/75$ to $1/150$ grain every four hours is employed to depress vagal activity It is hoped that this may likewise tend to reduce the volume of gastric secretion Perhaps ephedrine may similarly assist in the inhibition of flow of pancreatic juice Obviously, drugs which stimulate the vagus nerves, such as prostigmine, which might conceiv-

ably be used to overcome distention, are to be withheld

5 Other Measures—Perhaps some thought should be given to the possible occurrence of hypocalcemia in patients who have suffered very acute attacks of pancreatitis Blood calcium determinations should be carried out, at least after the third day, and calcium gluconate administered parenterally if a calcium deficit is detected

The length of time in which the more rigid type of therapy is to be carried out depends upon the clinical status of the patient Recovery from shock, return of the temperature to normal a drop in the leukocyte count, and recedence in the physical evidences of inflammation constitute the most important guides It was necessary to continue the strict regimen for two weeks in patient H Γ and for only four days in patient S S

Our enthusiasm for the plan of treatment outlined above seems justified in view of recovery in 100 per cent of patients, an experience which was unheard of in the treatment of acute pancreatitis on our service previously It should be stated however that in only three of our patients was a diagnosis of acute severe massive necrosis of the pancreas entertained In three of the remainder it was thought that the inflammation was of lesser degree, and the lesions were classified as examples of acute edema. In the remaining four cases proof was finally obtained supporting a primary diagnosis of chronic interstitial pancreatitis, and *our treatment was carried out for a severe episode* of acute inflammation of the pancreas superimposed upon chronic interstitial pancreatitis

Summary

The diagnosis and treatment of acute pancreatitis constitute a problem with many facets This paper is not concerned with a detailed discussion of every phase of the problem A study has been made of ten instances of acute inflammation of the pancreas, consecutively diagnosed and treated during a period of fourteen months. As a result of this study the following items have been discussed (1) difficulties encountered in making a diagnosis at the bedside, (2) the significance of imbibing of alcohol and of gallbladder disease in the precipitation of the attacks, (3) the definitive value of blood serum enzyme determinations (4) experience with delayed hypocalcemia following the acute attack (5) electrocardiographic changes occurring in association with the acute pancreatic insult, and (6) an outline of treatment designed to splint the pancreas, based upon sound physiologic principles.

We should like to express our appreciation to Dr Samuel Bellet for his cooperation in the study and interpretation of the electrocardiographic changes in these cases.

References

1 Fitz R. H. Boston M. & S. J 120: 181 (Feb. 21) 1889
2. *Ibid.* 120: 205 (Feb. 28) 1889
3 *Ibid.* 120: 229 (Mar 7) 1889
4 Balser W : Virchow s Arch. f path. Anat. 90 5*0 (1882)
5. Zoepffel H.: Deutsche Ztschr f. Chir 175: 301 (1922)
6 Elman, R.: Ann. Surg. 105: 379 (Mar) 1937
7 Popper H L. and Necheles, H. Gastroenterology 1: 490 (1943)
8. Bockus H. L. Gastro-enterology Philadelphia W B. Saunders Co. 1946, vol 3 p 770.
9 Clark, E.: Am. J Digest Dis. 9: 423 (1942)
10. Carter S. J : Ann. Surg. 122: 1 (1945)
11. Popper H. L. Am. J Digest. Dis. 15: 1 (1948)
12. Somogyi, M. Proc Soc Exper Biol. & Med. 32 535 (1934)
13. Cherry I. S. and Crandall, L. A.: Am. J Physiol. 100: 266 (1932)
14 Johnson, T A and Bockus, H. L. Arch. Int. Med. 66: 62 (1940)
15. Edmondson, H. A. and Berne C. J : Surg. Gynec & Obst. 79 240 (1944)
16. Gottesman, J Costen, D , and Beller A. J Proc. oc. Exper Biol. & Med. 49: 365 (1942)
17 *Idem.* J A.M.A. 123: 892 (1943)
18. Bellet, S. Nadler C. Gases P and Lanning, M. Gastroenterology To be published.
19 Körte, W : Ann. Surg. 55 83 (1912)
20. Gross, O : and Gulcke, N : Die Krankheiten des Pankreas, Berlin Julius Springer 1924.
*1. Schmieden, V and Sebening, W Arch. f. klin. Chir 148: 319 (1927)
22. DeTakats, G and MacKenzie, W D : Ann. Surg. 96: 418 (1932)
23. Blikkelson O Acta chir Scandinav 75: 373 (1934)
24. Rowland V C Am. J Digest. Dis. 1: 441 (1934)

FORRESTAL APPROVES INTEGRATION OF PANAMA CANAL ZONE HOSPITALS

Secretary of Defense James Forrestal has approved integration of National Military Establishment hospital and medical services in the Panama Canal Zone area, according to a news item which appears in the August 14 issue of the *J.A.M.A.*

Approval was given on recommendation of the committee on medical and hospital services of the armed forces of which Dr Paul R. Hawley, former chief medical officer of the Veterans Administration is chairman.

Under the integrated program hospitalization of the personnel of all three military services is assigned to the Navy on the Atlantic side of the zone and to the Army on the Pacific side.

STREPTOMYCIN IN TUBERCULOSIS EXPERIMENTAL OBSERVATIONS ON EFFICACY, SHORTCOMINGS, AND LIMITATIONS

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(From the Division of Experimental Medicine, Mayo Foundation)

IN THE present phase of the development of specific drug treatment of tuberculosis, it might be profitable to examine first certain basic considerations of the problem of chemotherapy of this disease, second, the character of the evidence obtained by animal experimentation on which the clinical use of streptomycin has been based, and lastly, the present limitations or shortcomings of the clinical use of streptomycin

The Problem

The problem of successful chemotherapy of tuberculosis is especially difficult for reasons inherent in the nature of the disease First of these reasons is the essential pathologic character of infections produced by the tubercle bacillus The pathogenesis of tuberculosis differs markedly from that of many infections that have proved amenable to a chemotherapeutic attack. Tuberculosis is not a simple bacteremia or a localized acute or subacute infection Instead, it represents an elaborate immunologic and complex morbid reaction, which usually develops in a leisurely manner and may persist for years In the evolution of the process, proliferation and destruction of tissue frequently go hand in hand As older portions of the lesions necrose or soften, other portions may fibrose, heal, or calcify Retrogressive and progressive changes are frequently operative in the same patient In fact, it is common to find within a tiny focus signs of quiescence associated with signs of earliest activity and softening Cavitation and dense peripheral fibrotic encapsulation are characteristic in certain forms of the disease Such lesions are in marked contrast to the miliary lesions of hematogenous dissemination

The pathogenesis of tuberculosis can best be understood if it is recognized that this disease is protean in character As a matter of fact, the variability of the morbid conditions produced by the tubercle bacillus is so great that we may well question the correctness of referring to tuberculosis as a single disease This is illustrated by the dissimilarities of tuberculosis in different situations, such as the skin, the kidneys, the meninges, the endobronchial mucosa, and the bones, and the various forms of pulmonary tuberculosis The multiplicity of the morbid aspects of the disease and the inconsistent and complex character of the reactive process make the problem of arrest, healing, and cure of tuberculosis an exceedingly formidable one

Evidence of Streptomycin Effectiveness

The capacity of streptomycin to exert a deterrent effect on tuberculosis has been established by animal experimentation [1–3] Previous work with a long list of sulfones, particularly derivatives of 4,4′-diaminodiphenylsulfone, had demonstrated the vulnerability of the tubercle bacillus in vivo to the antagonistic action of specific chemicals Particularly, the results of the work with promin, diasone, and promizole left no doubt that tuberculous infections could be modified favorably by chemotherapy [4–7] It is true that the shortcomings of the sulfones in treating clinical tuberculosis were many and formidable, yet the application of these substances to the problem of a chemical attack on the tubercle bacillus was noteworthy After countless failures, it became evident that the disease produced by the tubercle bacillus could be attacked chemically with expectations of success

That streptomycin is a potent antituberculous substance became evident from the first (and inadequate) experiment that Hinshaw and I performed with this drug [1] Our first supply of streptomycin was received directly from Dr Waksman in the spring of 1944 The amount available was sufficient to treat only four tuberculous guinea pigs for a relatively short time The results indicated without question that in the presence of streptomycin fully virulent tubercle bacilli in the experimental animal were unable to express their usual pathogenicity Many additional experiments followed, the results of which demonstrated unequivocally the antituberculous potency of this antibiotic

The more important of the observations from our numerous animal experiments may be referred to briefly It was demonstrated repeatedly that, under the influence of streptomycin, tuberculous infections, established many weeks before treatment was started, were dramatically changed The disease lost its progressive momentum, the lesions became quiescent, retrogressed, or resolved Many animals in which the disease was widely disseminated when treatment was started were without gross or microscopic evidence of in-

Presented by invitation at the 142nd Annual Meeting of the Medical Society of the State of New York, New York City Section on Medicine May 20 1948.

fection when treatment was discontinued [2] This was truly a dramatic and unprecedented demonstration of the ability of a drug to gain mastery over infections produced by tubercle bacilli The results with streptomycin were superior to those obtained previously with the sulfones. This fact coupled with the relatively low toxicity of streptomycin for animals, provided justification for its limited clinical trial [6]

Additional studies demonstrated that streptomycin was effective therapeutically against experimental infections induced by a considerable number of recently isolated human strains of tubercle bacilli and against tubercle bacilli of the bovine type [9] In previous experiments the infection had been established by a laboratory stock strain of tubercle bacilli (H37Rv) The results with the human and the bovine strains provided the clinician with additional confidence in the use of streptomycin in treatment of the naturally acquired disease

The most convincing evidence of the ability of streptomycin as an antituberculous agent was *revealed in an experiment in which the animals* were inoculated intravenously with an exceedingly large (1 mg) dose of tubercle bacilli [10] In this experiment the mean survival time of the untreated controls was approximately nineteen days This was in striking contrast to the results among the animals that received streptomycin, most of which, as a consequence of therapy, lived for many months

In this experiment a widely disseminated hematogenous infection was obtained almost immediately after inoculation. One may assume, therefore, that the character of the infection induced would offer profound difficulties for any known or hypothetic therapeutic substance It is true that the infection was suppressed, for the most part, and not eliminated as a consequence of streptomycin therapy This limitation of the effective range of streptomycin being recognised, the fact remains that even under conditions that were most formidable, the drug did modify favorably—in fact, dramatically—what was in the untreated controls a violent and rapidly fatal disease.

While additional data could be presented the experiments referred to indicated the capacity of streptomycin to reverse a highly malignant infectious process in an animal whose natural resistance to tuberculosis is of low degree The treated animals gained weight, they lived longer and had very little, if any, demonstrable parenchymal disease when treatment was discontinued

Morphologic Evidence of Therapy

In addition to the significant extension of life in the tuberculous animals as a result of streptomycin therapy and the fact that little if any tuberculous disease is demonstrable when the treated animals are observed at necropsy, another important criterion of antituberculous action should be considered. This is concerned with the ability of streptomycin to promote striking changes in the histologic characteristics of residual disease These changes connote healing and provide tangible evidence that, when the pathogenic activities of the infective agent are suppressed, the natural mechanism of healing and repair becomes effectively operative.

In animals treated adequately with streptomycin, the residual lesions are usually small, discrete structures with the features associated with regression or arrest of a tuberculous infection "Hard" or epithelioid tubercles may be found in the spleen and liver, less often in the lungs. The most frequent changes indicative of retrogression are fibrosis, hyalinization, and calcification of what one may assume were lesions previously progressive and potentially destructive Not infrequently after treatment with streptomycin, *residual lesions occur which have the structural* appearance of nonspecific granulomatous nodules with few if any recognizable features of tuberculosis.

Under natural conditions, when tuberculosis heals, alterations similar to those observed in streptomycin therapy also occur However, under natural conditions, in which the suppression of tubercle bacilli is dependent entirely on the intrinsic power of the host, the regressive histologic changes are relatively slow to evolve and frequently inadequate The principal value of an antagonistic agent effective in vivo against tubercle bacilli is the fact that the host is not dependent for the suppression of the bacterial population on the too often ineffectual mobilization of the natural antagonistic factors. An effective therapeutic substance creates a situation whereby the progression of the bacterial population continues with increasing difficulties, if at all. Consequently, there is created a threshold favorable for the healing mechanism to become effective within a relatively short period In tuberculosis this is the essential value of streptomycin

Limitations of Streptomycin*

Like every other substance of value in chemotherapy streptomycin *possesses certain short*comings or limitations. On a comparative basis the antibacterial efficacy of streptomycin against tubercle bacilli in vivo is amazingly high. However, from data obtained in our first animal

* Admirable discussions of the limitations and shortcomings of streptomycin as a therapeutic agent in certain forms of clinical tuberculosis have been contributed by McDermott Muschenheim, and their associates. [12]

experiment it was apparent that with this drug a complete bactericidal effect on tubercle bacilli in vivo would be difficult to achieve Many additional observations have confirmed this impression This was the first limitation of streptomycin as a therapeutic agent to be recognized

As mentioned previously, the antagonistic action of streptomycin against tubercle bacilli results largely in a suppression of the normal pathogenic activities of the organisms As a consequence of this suppressive action, the natural mechanisms of resistance and repair gain ascendancy over the factors of pathogenesis As a result, the disease may soon be converted from a progressive, destructive process to one that is arrested, with progression unlikely during the period of treatment This provides reason for the belief that by the intelligent use of this drug the time necessary for the arrest and stabilization of the tuberculous process and for the final rehabilitation of the tuberculous patient may be significantly shortened

Another limitation of streptomycin as an antibacterial agent in tuberculosis is that of drug resistance There are many aspects of the problem of streptomycin-resistant tubercle bacilli that are not well understood Until more information is available, it would be well to be circumspect in assessing the exact significance of this phenomenon Our present point of view may be summarized briefly as follows Before treatment with streptomycin the population of acid-fast bacilli in most patients is predominantly sensitive to streptomycin However, even before treatment with streptomycin there are in many patients a few tubercle bacilli that are more resistant than the vast majority of the bacterial population These resistant bacteria we regard as mutants or variants

As a consequence of the combined antagonistic action of streptomycin and the related activated mechanism of retardation on the part of the infected host, the streptomycin-sensitive bacteria are gradually rendered impotent and may even disappear Conversely, the suppression of streptomycin-sensitive bacteria is accomplished without a similar antibacterial action on the spontaneous variants which are resistant to the drug Since these latter strains are not amenable to the action of streptomycin, their persistence or eventual disappearance depends on the intrinsic ability of the infected tissues to mobilize factors of effective somatic opposition The resistant variants may persist for many months after cessation of treatment of the patient with streptomycin. In some instances they have eventually been replaced by tubercle bacilli predominantly sensitive to streptomycin When the population of tubercle bacilli is predominantly resistant to streptomycin by in vitro tests, further administration of the drug is unwarranted It has been shown experimentally in animals that infections due to streptomycin-resistant tubercle bacilli do not respond to treatment with this drug [13]

One should not, however, assume that, because the tubercle bacilli present at the end of the period of treatment are highly resistant to streptomycin, treatment has failed or that the disease will necessarily continue to progress There is no evidence that streptomycin-resistant strains of tubercle bacilli are more virulent than are strains highly sensitive to streptomycin Furthermore, my associate, Dr Hinshaw, has observed several cases in which severe progressive pulmonary tuberculosis continued to improve clinically after treatment had been stopped, this, in spite of the fact that tubercle bacilli markedly resistant to streptomycin predominated at the end of the treatment period In addition, in many of these cases the patients have eventually become bacteriologically negative for tubercle bacilli

If the use of streptomycin in treatment of tuberculosis is restricted to patients who, as experience has taught, will be most likely to benefit from this form of therapy, the problem of streptomycin-resistant tubercle bacilli will be reduced to one of minor importance

Unlike the treatment of many of the more acute infectious diseases, the successful treatment of tuberculosis involves a great deal more than the elimination or the suppression of the infective bacteria Unfortunately, in tuberculosis there usually exist alterations of tissue of varying degrees of severity These must be corrected by surgical measures or by the slower process of natural healing, repair, resolution, regression and calcification

It is illogical to assume that a chemotherapeutic substance can in some incredible manner cause the immediate and complete structural restoration of tissues irreversibly damaged or destroyed The rehabilitation of the injured tissues, once the infection has been subdued or eradicated, will depend largely on the individual constitutional capacity of the patient to restore that which has been damaged or destroyed Streptomycin or any other specific chemotherapeutic agent cannot properly be held responsible for failure to attain restoration of anatomic defects which characterize many tuberculous infections

The toxicity of streptomycin must be considered as another of the limitations of this substance as a specific agent in the treatment of clinical tuberculosis Like all other agents used in chemotherapy, streptomycin has certain toxic potentialities The most important of these toxic effects is a very unusual neurologic reaction manifested as vestibular dysfunction The occurrence

and severity of this reaction appear to be related to the size of the daily dose, the duration of streptomycin therapy, and, perhaps, to the interval of time between injections of the divided individual daily dose

Dr Hinshaw considers that a daily dose of 1 Gm. of streptomycin for six to eight weeks is usually well tolerated In patients receiving this amount of the drug, the symptoms of vestibular dysfunction are ordinarily mild or may be absent. Since this dose seems to be therapeutically effective in many forms of clinical tuberculosis, larger doses should be used only in exceptional circumstances

Experience indicates that, when streptomycin is used properly, its toxicity is sufficiently low to justify its use in situations that are serious or which may become so In infections that have a favorable prognosis under conventional forms of therapy, the drug should be used with great discretion if at all.

In recapitulation one may say that the shortcomings or limitations of streptomycin as a tuberculochemotherapeutic agent are essentially the same as those associated with the use of specific drugs, including present known antibiotics in the treatment of nontuberculous infections The effective range of all known antibacterial agents is definitely circumscribed, and none of the agents is able to replace or repair structural alterations or tissue damage existing as a consequence of the infection It is important that none of these drugs be used without proper regard for potential untoward effects.

A complete understanding of the bacteriologic and pathologic characteristics of the condition to be treated will assist in resolving much of the confusion that is sometimes apparent when the actual results of chemotherapy fall short of the unreal expectations frequently engendered when new agents are administered indiscriminately It is reasonable to assume that, as more information regarding streptomycin is obtained, the drug will be used more effectively and with fewer disappointments

Comment

In appraising the efficacy of any drug in the treatment of a tuberculous infection it is important to distinguish clearly between the antibacterial action against the tubercle bacillus and the structural alterations that represent the reaction of the body to infection by this organism.

The objective of the search for new drugs against tuberculosis should be an agent capable of preventing further progression of the disease by eliminating the infective agent. Only the natural reparative processes of the body can heal or repair the damaged tissues. However, a suitable antibacterial agent in treatment of tuberculosis can contribute importantly to the final arrest of the disease and healing of the injury by suppressing or by eliminating the infective bacteria. When tubercle bacilli are inactivated or destroyed, the natural processes of stabilization and of healing, which are notoriously slow in tuberculosis treated conventionally, may be markedly accelerated As mentioned previously, this appears to be the most likely explanation for the beneficent effects of streptomycin as an antituberculous agent.

Considering the relatively short time that has elapsed since streptomycin was first announced considerable information regarding certain aspects of this antibiotic has accumulated. The problem of its preparation in large quantities has been solved, its chemical structure has been revealed, and its therapeutic indications and contraindications are becoming better understood as are its limitations and toxic potential However, a great deal more remains to be discovered before this drug ceases to be of interest to the biologist the chemist, the pharmacologist, the bacteriologist, the pathologist, and others concerned with certain basic problems that streptomycin has propounded

The momentum acquired by the therapeutic assault on tuberculosis as a consequence of the clinical results with streptomycin prompts a word of caution in the future development of this field of therapeutics It can be predicted with considerable assurance that eventually other antituberculous drugs will be found that will be more effective than any known at the present time In the search for such new drugs let us not be impatient and bypass important basic experimentations Let us not subject patients prematurely to substances that may be entirely useless therapeutically and even potentially dangerous.

The initial clinical application of a new drug to determine its possible value as an antituberculous agent must be undertaken only when its relative safety and effectiveness against tubercle bacilli have been established by animal experimentations There is no acceptable substitute for this approach.

Lastly, we should be realistic in our expectations as to the attributes or essentials of the theoretically ideal chemotherapeutic substance. Even though a drug becomes available that is essentially nontoxic and is sufficiently antagonistic to tubercle bacilli to achieve a completely bactericidal effect within a few hours, the tuberculous patient will still require expert medical or surgical attention.

In other words, it is illogical to assume that treatment of the tuberculous patient will ever become the sole responsibility of the chemotherapist. Instead, experience has definitely shown

that the patient's best chance for recovery is provided when the conservative and intelligent use of chemotherapy is combined with modern medical and surgical procedures

Discussion

Howard Dayman, M D , *Buffalo* —It is a privilege to hear Dr Feldman present his observations on the antibiotic properties of streptomycin in tuberculosis, and I am sure that most clinicians would find their views generally in accord with those he has expressed Administration of the drug unmistakably favors resolution of exudative pulmonary lesions, particularly if it is used early, before extensive tissue necrosis has come about It has less effect on chronic productive lesions in the lung and, so far as we can determine, will very seldom cause closure of cavity At the Meyer Memorial Hospital, we give streptomycin quite regularly in the presence of acute pneumonic tuberculosis It is also used to shield the patient against extension of the disease during collapse therapy and in selected cases of tuberculous bronchitis, laryngitis, and enteritis We look upon it as a supplement to standard methods of treatment rather than an independent remedy

We are inclined to view the development of streptomycin resistance more seriously than Dr Feldman's remarks might imply Clinical effectiveness of the drug in man as well as animals depends on the presence of susceptible tubercle bacilli Organisms resistant to 10 or more units of streptomycin per cc have appeared in the body secretions as early as one month after starting treatment, but in one case of tuberculous meningitis in relapse the organisms were sensitive to streptomycin after eight months of drug therapy In most cases there would appear to be a time limit on the effective use of streptomycin This is unfortunate in a disease so prone to relapse as tuberculosis Even following a favorable response to streptomycin, the ultimate outlook may be grave if natural resistance is poor This has been demonstrated in susceptible animals which, despite continued use of the drug, succumb because the invading organisms are drug resistant

Clinically, our aim in using streptomycin has been to tide the patient over an acute phase of the disease, obtaining as much resolution as possible during the period of drug effectiveness It is hoped that the patient can thereby muster sufficient resistance to continue the healing process To further this end we have used collapse therapy concurrently in some cases, and in all instances have employed such supportive measures as would improve the patient's immunity With combined treatment of this sort the early response has been most gratifying, particularly in young people with acute disease It remains to be seen whether the response will continue In the final analysis, lasting recovery will probably depend on the degree of immunity which the patient develops This is as true now as it was before the use of streptomycin

It would be highly desirable if drug resistance could be circumvented In some cases drug resistance appears late Dr Feldman has remarked that in certain instances streptomycin-sensitive strains return in the secretions The view that a resistant variant to one drug may not be resistant to another drug suggests that the use of multiple drugs would be a logical step

Susan J Hadley, M D , *New York (By invitation)* —The fight against tuberculosis has, until recently, been largely confined to the field of preventive medicine and public health For years, workers, beginning with Robert Koch, have proposed and exploited many types of parenteral medications It was not until Dr Feldman and Dr Hinshaw first demonstrated the outstanding effectiveness of streptomycin on experimental tuberculosis in 1944 that real hope could be held for a curative agent Since then, their original, careful clinical and laboratory work has been repeatedly confirmed by others, and a bulk of statistical data has served to add further support We have just heard an excellent discussion of the present status and problems associated with the use of streptomycin in tuberculosis

Certainly, no one who has seen a single case of miliary tuberculosis respond to streptomycin can doubt the profound effect the antibiotic has on the disease In our group of patients at the New York Hospital we now have treated 20 cases of hematogenous tuberculosis, of which nine are alive and six completely well for a period which averages sixteen months since the end of therapy That we have not been completely successful in our treatment is not so important as the fact that we have reduced the case fatality from 100 per cent to 75 per cent on a long-term basis This figure compares well with the penicillin treatment of pneumococcal meningitis

The problem of the treatment of pulmonary tuberculous infections is a more common one Here, unfortunately, the nature of the disease restricts the success of treatment, as Dr Feldman has pointed out Although less than 5 per cent of patients will progress and at least 80 per cent will show symptomatic improvement under therapy, even short-term follow-up and, certainly, immediate laboratory evaluations are not as encouraging In our series of 60 patients who have been followed six months or more since the end of streptomycin treatment, almost 50 per cent who showed initial improvement had x-ray evidence of progression later Most of these exacerbations occurred within four months of the finish of therapy

More encouraging, however, is the fact that 50 per cent are completely well up to one and one-half years after streptomycin was discontinued To accomplish this, various types of ancillary therapy were employed I cannot stress enough the need for continued bed rest, despite what may seem to be unusual short-term improvement This should approximate the amount previously calculated before antimicrobial drugs were used Some of our most remarkable cases have eventually broken down because of unsupervised aftercare as a result of poor patient cooperation In addition, there is no doubt that streptomycin can be used to great advantage to prepare what would ordinarily have been hopeless patients for collapse therapy We have used thoracoplasty particularly to advantage

The chief disadvantage in treatment is the emer-

gence of resistant organisms. There are many unsolved aspects to this problem from an experimental point of view However certain facts are now known clinically which are of help First is that there is a fairly good correlation between in vitro and in vivo effectiveness. That the phenomenon of resistance is principally a time factor can be determined from certain of our statistics. Of a group of 27 patients treated with 3 Gm of streptomycin for one hundred twenty days, only two showed sensitive organisms at the end of treatment and for a period of follow-up as long as one year while with 12 patients treated with 3 Gm for only forty two days all but one showed the predominant organism to be sensitive up to four months With the dose of 1 Gm. a day for forty two days, which is now more commonly used, only 10 per cent were out of the therapeutic range after four months It is of interest however, to note that in a small group of eight patients who were treated for a second forty two-day period with 1 Gm., 50 per cent showed the emergence of resistant organisms by the end of treatment.

One more important factor in determining the length and amount of therapy is the toxicity of the drug We have encountered no important difficulties other than damage to the vestibular apparatus At first with the use of 3 Gm of the drug for forty two days or more, almost 100 per cent became dizzy and showed loss of response on caloric stimulation With 1 Gm., however only 13 per cent lost function Dr Tompsett in our department has determined that this 13 per cent fell into a group who received more than a total daily dose of 20 mg per Kg From this, a safer method of computing dosage becomes apparent. At present providing there is no serious kidney damage, no more than 20 mg per Kg per day should be used in long-term therapy

From the accumulated data, it is apparent that treatment can be short term only because of the early emergence of resistant strains of tubercle bacilli and must be limited in dosage to avoid vestibular damage. In addition, although remarkable results are possible the disease remains chronic and recurrent so that often for maximum benefit, collapse therapy and, certainly, bed rest are necessary to consolidate gains achieved

The early predictions made by Dr Feldman and his associates have served as a reliable foundation for the clinical studies which have been undertaken in the past two years. Although the complete answer to the successful treatment of tuberculosis has not been found streptomycin has been adequately demonstrated to be a valuable adjunct in therapy

References

1 Feldman, W H. and Hinshaw, H. C.: Proc. Staff Meet. Mayo Clin. 19: 593 (Dec 27) 1944.
2. Feldman, W H. Hinshaw, H. C and Mann, F C. Am. Rev Tubere. 52 209 (Oct.) 1945.
3. Feldman W H. J Roy Inst. Pub. Health & Hyg 9: 343 (Nov) 1946.
4. Feldman W H. Hinshaw, H. C. and Moses H. E. Proc. Staff Meet. Mayo Clin. 15: 695 (Oct. 30) 1940.
5 *Idem.*: Arch. Path. 36 64 (July) 1943.
6. Feldman, W H. Hinshaw, H. C. and Mann, F C.: Am. Rev Tubere. 50: 418 (Nov) 1944.
7 Feldman, W H.: J Roy Inst. Pub. Health & Hyg. 9: 297 (Oct.) 1946.
8. Hinshaw H. C. and Feldman, W H.: Proc. Staff Meet. Mayo Clin 20: 313 (Sept. 5) 1945.
9 Feldman, W H and Hinshaw H. C.: Am. Rev Tubere. 53: 428 (May) 1947
10. Feldman, W H Karlson A. G and Hinshaw H C: *Ibid.* 56: 346 (Oct.) 1947
11. McDermott, Walsh, Muschenheim, Carl, Hadley Susan J, Bunn, P A. and Gorman Rosemary V: Ann. Int. Med. 27: 789 (Nov) 1947
12. Muschenheim, Carl, McDermott, Walsh, Hadley Susan J., Hull-Smith, Harriet, and Tracy Alice: Ann. Int. Med. 27 989 (Dec.) 1947
13. Feldman W H., Karlson A. G and Hinshaw H. C.: Am. Rev Tubere. 57 162 (Feb.) 1948

STARVATION AND THE LIVER

Hepatic tissue and function are not always damaged by malnutrition, as shown by 21 German citizens, 6 to 46 per cent underweight, who had eaten low-protein diets for more than a year Biopsy revealed no fatty degeneration, cirrhosis, or necrosis Drs. Sheila Sherlock and Veryan Walshe of the Postgraduate Medical School of London England observed low blood volume, hemoglobin, serum protein and cholesterol, and fecal urobilinogen. Hippuric acid synthesis, bromsulfalein excretion, glucose and adrenalin tolerance, Insulin sensitivity hepatic glycogen serum bilirubin, and alkaline phosphatase of liver and serum were unaffected. Liver cells contained much iron.—*Modern Medicine, July 15 1948*

ALTITUDE DOES NOT INJURE HEART

Contrary to widespread belief, living at an altitude as high as 8 000 feet is not injurious to the heart, says Gonzalo Esguerra Gomez M.D., of Bogota, Colombia.

Writing in the August 7 issue of the *Journal of the American Medical Association* Dr Gomez bases his conclusion on a study of 480 residents of Bogota, which is 8,016 feet above sea level. In none of these residents did he find enlargement of the heart out of proportion to the general build, or abnormal variations in blood pressure pulse, respiration or number of red blood cells.

Prolonged strenuous exercise can cause enlargement of the heart, he says but no more so at 8 000 feet than at sea level.

RICKETTSIALPOX

HARRY M ROSE, M D , New York City

(From the Departments of Medicine and Bacteriology, College of Physicians and Surgeons, Columbia University, and the Presbyterian Hospital)

RICKETTSIALPOX is the denomination of a disease entity which was first recognized in 1946 and, up to the present time, has not been observed outside the metropolitan area of New York City Huebner and others identified the causative agent as a new species of rickettsia, Rickettsia akari, and showed that the infection is, in all likelihood, transmitted to man by the bite of a blood-sucking insect, a rodent mite, Allodermanyssus sanguineus [1 2] These same investigators isolated R akari from mice trapped in apartment houses where cases of rickettsialpox had occurred, and there is no doubt that the common house mouse, *Mus musculus*, is a reservoir of the infection [3] The clinical features of rickettsialpox were first reported by Sussman, Shankman, and later in an extended series of cases by Greenberg and his collaborators [4–7] The illness is usually characterized, at its onset, by the appearance of a primary cutaneous lesion which develops at the point of the insect's bite This is followed about a week later by fever, chills, headache and malaise, and a generalized skin eruption that may simulate the rash of chickenpox Although the patient may be severely ill for several days, the disease is benign, and no fatalities have been reported

Rickettsialpox is now of common occurrence in all parts of New York City, except Staten Island More than 350 cases have been formally reported to the Department of Health since the spring of 1946, and many others have probably passed unrecognized, especially those of mild or atypical character [8] During the past year, since April, 1947, we have observed 21 cases of rickettsialpox at the Columbia-Presbyterian Medical Center, of which 17 were hospitalized and studied closely These cases furnish the basis for the present communication, which deals with the clinical manifestations of the disease, the methods employed for specific serologic diagnosis, and the technics used to isolate the responsible agent

Case Reports

Three cases which illustrate important features of the disease, are reported in brief detail

Case 1 —The patient was a 40-year-old white man, a painter, who entered the hospital on July 25, 1947 The past history was irrelevant, except that he had received typhus vaccine while in the Army in 1944 Three days before admission the patient noticed a lesion on his back, just below the right scapula, which he thought was a boil There were no symptoms at this time On the day of admission he awoke with headache and a feeling of feverishness He took his temperature and found it to be 103 F He had chilly sensations but no shaking chill He also noted that he ached all over and that his throat was slightly sore

On admission to the hospital, his temperature was 105 F Physical examination revealed a lesion just below the right scapula consisting of an area of erythema and induration about 1 5 cm in diameter with a central dark eschar The leukocyte count was 6,500 with polymorphonuclears 81 per cent, lymphocytes 7 per cent, monocytes 5 per cent, basophils 1 per cent There were no other findings of importance at this time

The following day the patient continued to have malaise and headache, and the temperature was 103 2 F Enlargement of the right posterior cervical and supraclavicular nodes had now developed, and a rash on the trunk was observed for the first time, consisting of erythematous macules, many of which had central vesicles These were described as having a varicelliform appearance

During the next forty-eight hours the temperature fluctuated between 103 and 104 F The rash persisted, but no new cutaneous lesions made their appearance Throughout the febrile period there was a marked relative bradycardia Additional laboratory findings showed urinalysis, negative, blood culture, sterile, chest x-ray, no abnormal findings, Weil-Felix test negative with Proteus OX19 and OXK The patient's skin eruption and fever disappeared rapidly after the fifth hospital day, and at the time of discharge he was without symptoms

We were unable to determine where the patient contracted his disease In his occupation as a painter it is possible that the exposure might have occurred in his place of work However, it is of interest that at least four adults who lived in his apartment house had recently been ill with what was called "chickenpox"

A specimen of blood taken on the seventh day of the patient's illness gave a negative complement fixation test with rickettsialpox antigen The test was positive in a serum dilution of 1 32 on a specimen of blood obtained seven weeks later

Case 2 —The patient was a 33-year-old Negro woman, a domestic, who entered the hospital on June 19, 1947 The past history was irrelevant

SIX days before admission the patient noticed a papule near the left angle of her mouth, together with some swelling of a lymph node beneath her

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On the following day the papule became er and a vesicle appeared in its center The mental node became painful Two days before ission she developed a headache felt feverish found her temperature to be 102 F On the owing day a rash appeared generally distributed r the body and she had two shaking chills On ission to the hospital she did not appear acutely

Physical examination revealed a crusted lesion ut 1 cm in diameter at the left angle of the uth. Scattered over the trunk, extremities and was a maculopapular eruption and many of the ons exhibited a central area of vesiculation Be- th the chin there was a firm tender node about 2 . in diameter

The rest of the examination was essentially nega- e. The leukocyte count was 2,500 with poly- rphonuclears 54 per cent lymphocytes 40 per it, monocytes 5 per cent, basophils 1 per cent. r the first twenty four hours the temperature led between 101 and 102 F but during the next o days it fell to normal, and the rash rapidly led. Additional laboratory examinations were follows urinalysis negative blood culture, rile, chest x ray, no abnormal findings sheep l agglutination test positive in a serum dilution of 8 Weil-Felix test negative with Proteus OX19 d OXK.

The source of this patient s infection was not de- mined but was probably in the home. She had ted that her apartment was infested with mice ie did however in the course of her work as a mestic, make frequent trips to downtown Man- ttan and to the Bronx. There is no history of her countering mice in the homes of any of her em- oyers.

The rickettsialpox complement fixation test on a mple of blood collected on the seventh day of the ness was negative. The test was positive in a rum dilution of 1 64 with a specimen of blood ken seven weeks later

Case 3—The patient was a 56-year-old white oman a housewife who was admitted to the hos- ital on July 20 1947 The past history was irrele- ant.

About ten days before admission the patient be- an to note chilly sensations and to have frequent veats accompanied by a low-grade fever ranging om 100 to 101 F At the same time she had moder te malaise and a little frontal headache. Three ays before admission she had a shaking chill and her emperature rose to 104 F The headache became ery severe Two days before entry a rash appeared ver the trunk and extremities but was particularly oticeable over the chest and abdomen At the ime of admission the temperature was 103 6 F The patient appeared moderately ill and com- lained of severe frontal headache.

Scattered over the back chest abdomen and ex remities were numerous papulovesicular lesions about 0.5 cm. in diameter One lesion was seen on the left side of the palate. There was no lymph adenopathy A questionable primary lesion was present on the left lower leg The remainder of the physical examination was essentially negative. The leukocyte count was 2 800 with polymorphonuclears 58 per cent and lymphocytes 32 per cent. Eleven abnormal lymphocytes suggesting those seen in in- fectious mononucleosis were observed in the blood smear

On the following day the rash had increased. It was now observed over the legs arms body and scalp with several lesions on the palate The leuko- cyte count was 2 900 with polymorphonuclears 76 per cent and lymphocytes 24 per cent. The lymph ocytes in this smear were described as normal. The patient continued to run a fever for the first four days during which time she had moderate malaise headache and frequent chilly sensations By the fifth day however the temperature had declined to normal and the rash was fading Additional labora tory examinations gave the following results urin alysis negative blood culture sterile, chest x-ray negative sheep cell agglutinins positive in a serum dilution of 1 16 Weil Felix test negative with Proteus OX19 and OXK. At the time of discharge the patient was completely free of symptoms.

We have no definite idea where the patient may have contracted the infection She was a house- wife and it must be presumed that the infection was acquired in her home although she had not observed mice on the premises.

The rickettsialpox complement fixation test on the eleventh day of the disease was negative but it was positive in a serum dilution of 1 32 four weeks later

Clinical Manifestations

Most of the outstanding clinical and laboratory features of rickettsialpox are represented by the three cases just described The over-all findings in the series of 17 hospitalized patients will now be presented. The oldest of the patients was fifty six years of age, and the youngest was two years of age Eleven were men, and ten were women

Initial Lesion—In 15 of the 17 patients a pri- mary lesion could be identified with certainty These consisted of areas of erythema and indura tion from 1 0 to 2 5 cm. in diameter In two early primary lesions there was a large, central vesicle containing cloudy fluid In the others, however, the site of the original vesicle was represented by a central dark brown or blackish, crusted area, simulating closely the initial eschar that is seen in cases of tsutsugamushi disease or fievre boutonneuse The primary lesion was never tender or painful and in several cases had not been previ ously recognized by the patient.

Eight patients had single lesions on either the arms or legs In four others the primary lesions were seen near the left angle of the mouth at the base of the neck in the right anterior cervical area, on the neck in the left suboccipital area, and on the back below the right scapula. The remaining three patients were of interest in that two primary lesions were seen In one of these cases the lesions were on the forehead and abdomen in the second

on the forehead and the left leg, and in the third they were situated close together on the anterior aspect of the right thigh In practically every instance the lymph nodes draining the area or areas where the primaries were situated were enlarged and slightly tender In several instances the magnitude of the lymphadenopathy was striking, but there was never any evidence of lymphangitis

Cutaneous Eruption—In the majority of the cases the rash appeared within six days after the onset of the febrile period of the disease In one patient, however, an interval of nine days elapsed between the development of fever and the first appearance of the cutaneous eruption The individual lesions varied considerably in their appearance but usually consisted of erythematous maculopapular lesions ranging from 2 or 3 mm up to as much as 8 mm in diameter They were discrete and generally distributed over the body surface, including the face, and in three cases they were observed on the palms and soles In one individual the rash was so faint as to be almost inapparent In another patient the eruption was indistinguishable from that seen in murine typhus

The chief feature of the individual lesion in most cases, however, was the development of vesiculation In some instances this amounted to no more than a small, pinpoint, opaque area containing a little cloudy fluid at the summit of the papule In others the vesiculation was more outstanding, constituted the majority of the papule, and was surrounded by a narrow band of erythema These latter vesicles were individually difficult to distinguish from those seen in chickenpox The eruption was never pruritic, nor did it cause the patient any form of discomfort Following the disappearance of the eruption a few spots of brownish pigmentation remained, but no residual scarring was ever noticed

In five of the 17 cases an enanthem was present, the lesions on the buccal mucous membrane resembling those on the body surface The enanthem was present for less than forty-eight hours in three patients and, therefore, may be missed unless carefully searched for at daily intervals

Symptoms and Physical Signs—The constitutional symptoms were represented chiefly by fever, headache, chills or chilly sensations, and backache or general muscular aching These symptoms appeared from two to seven days after the appearance of the primary lesion Fever was present in every case, and the maximum temperatures ranged from as low as 101 F to as high as 105 6 F The fever curve was of the remittent type and fell to normal by lysis, generally within a week Headache was a very prominent feature and was usually frontal, although in two cases it was chiefly occipital Complaints of chilliness were made by nearly all patients, and nine of the 17 patients had frank, shaking chills with drenching sweats Backache and general muscular aching were quite severe, approximating that seen in cases of influenza Other symptoms occasionally noted were pain and stiffness of the neck, photophobia, nausea and vomiting, cough, and sore throat

Other than the presence of the primary lesion and the skin eruption there was ordinarily little to be discovered on physical examination Although the regional lymph nodes draining the area of the primary lesion were usually enlarged, a generalized lymphadenopathy was observed in only two cases The spleen was palpable at the height of the disease in three patients, and a mild conjunctivitis appeared in three others Examination of the cardiovascular system was not remarkable, and there were no abnormal physical findings in the lungs

Laboratory Findings

Routine laboratory examinations failed to reveal anything noteworthy with the exception of the leukocyte and differential counts Nearly all the patients showed a moderate or a marked leukopenia during the acute phase of the illness, and ten of the cases showed initial counts ranging between 2,500 and 4,500 cells per cubic millimeter, while only three had counts in excess of 7,000 In twelve of the patients the differential count was normal, and no abnormal cells were seen on the smear In five individuals, however, the smears showed a number of abnormal leukocytes—large mononuclear cells with vacuolated cytoplasm—resembling the peculiar cells that are customarily observed in the blood of patients with infectious mononucleosis Indeed, three of these five patients were admitted to the hospital with an original diagnosis of infectious mononucleosis It should be noted that these abnormal lymphocytes did not tend to persist in the blood and were present for only a day or two Tests for heterophile antibody never showed a significant titer of sheep cell agglutinins, either during the acute illness or in convalescence

Weil-Felix agglutination tests with Proteus OX19 and OXK were done with the acute and convalescent phase sera of 13 patients Although low agglutinin titers were occasionally observed in some cases, in no instance was a positive result obtained

Specific Serologic Diagnosis

During recent years serologic methods have been developed for the precise diagnosis of rickettsial infections The method most widely employed at present is the complement fixation test,

using antigens prepared from rickettsiae cultivated in the yolk sac of developing chick embryos. The principle involved is to perform such tests on serum obtained during the acute phase of the patient's illness and again during convalescence, usually from two to six weeks later. The detection of a significant rise in rickettsial antibody in the convalescent serum determines the temporal relationship of the immune response to the disease and thereby enables a retrospective diagnosis to be made. Short of actually recovering and identifying the causative agent, specific serologic reactions offer the only means for the exact diagnosis of infections caused by viruses and rickettsiae.

Blood specimens were obtained from all the patients during the acute phase of the illness and again during convalescence, from two to seven weeks later. The paired serums were tested by the complement fixation technic with antigens prepared from R. akari grown in chick embryos and also with similar antigens prepared from the rickettsiae of murine typhus and Rocky Mountain spotted fever.* In every case these tests revealed the development of specific antibody (Table 1) and thereby confirmed the clinical diagnosis. It is of interest that a considerable degree of cross reaction was observed in most cases with the rickettsialpox and spotted fever antigens, indicating a close antigenic relationship between R. akari and R. rickettsii. In addition, minor cross reactions were frequently observed with R. mooseri, the agent of murine typhus. These serologic relationships require further study.

TABLE 1.—RESULTS OF RICKETTSIAL COMPLEMENT FIXATION TESTS IN CASES OF RICKETTSIALPOX

Case	Day After Onset	Rickettsialpox Antigen	Spotted Fever Antigen	Murine Typhus Antigen
E. B.	8	0	0	0
	57	128	32	8
L. P.	7	0	0	0
	30	128	32	8
J. H.	7	16	8	16
	24	256	16	32
R. Q.	7	0	0	0
	54	64	32	0
M. S.	5	0	0	0
	60	16	32	0
R. W.	3	0	0	0
	3+	32	32	0
L. A.	6	0	0	0
	21	64	128	0
R. S.	0	0	0	0
	24	64	64	0
G. F.	7	0	0	0
	47	32	32	16
A. W.	8	16	32	16
	26	128	64	16
A. B.	7	0	0	0
	24	64	64	16
J. F.	7	0	0	0
	21	64	32	8
E. M.	7	0	0	0
	45	128	32	8
I. N.	6	8	8	8
	23	32	32	16
E. P.	2	16	16	16
	24	64	32	16
W. W.	3	0	0	0
	25	32	32	8
E. D.	8	32	64	16
	35	128	64	16

Isolation of the Causative Agent

Attempts were made in nine patients to recover the causative agent by inoculating blood collected early in the disease into mice, guinea pigs, and chick embryos. From seven of the patients R. akari was successfully isolated by mouse inoculation and from one of these patients the organism was also cultivated directly in chick embryos. In our experience the easiest and most certain method of isolation is to inoculate a group of eight or ten adult Swiss mice intraperitoneally each with 0.5 cc. of fresh citrated or defibrinated venous blood obtained as early in the febrile period of the disease as possible. Dilute brown agouti mice may be used as well as Swiss mice and appear to be about equally susceptible. If animals are not immediately available, the blood may be frozen and stored in solid carbon dioxide. We have isolated rickettsiae from such frozen specimens at intervals up to six months after storage.

Following inoculation, the animals rarely die in this first passage, but they often appear ill during the second week, exhibiting lassitude, ruffled fur, and labored breathing. Regardless of their external appearance the mice are sacrificed from seven to ten days after inoculation and examined for inguinal and axillary lymph adenopathy, splenic and hepatic hypertrophy and congestion and increased amounts of peritoneal fluid. Any or all these signs may denote infection, and rickettsiae can usually be easily demonstrated in smears of the liver, spleen, and peritoneal fluid stained by the Macchiavello method. Subsequent passage of suspensions of infected liver and spleen intraperitoneally into fresh mice usually results in a fatal illness, the animals dying five to nine days after infection with typical findings at autopsy.

From infected mice on the first or later passages, rickettsiae may be readily transferred to chick embryos. Suspensions of liver and spleen are inoculated into the yolk sacs of seven-day-old embryos which are incubated at 35° C. The embryos die four to nine days later, depending on the size of the inoculum, and numerous rickettsiae may be demonstrated in smears of the yolk sac stained by the Macchiavello method. Once established, the organisms may be maintained indefinitely in chick embryos by serial passage.

Differential Diagnosis

Rickettsialpox has been most frequently confused with chickenpox and in some cases especially in children the differential diagnosis may

* The murine typhus and spotted fever rickettsial antigens were generously supplied by Dr. Herald R. Cox, director Section of Viral and Rickettsial Research, Lederle Laboratories, Pearl River, New York.

not be easy The most important points are the presence of a primary lesion and the fact that the exanthem develops as a single crop of cutaneous lesions, whereas in chickenpox the eruption appears as successive crops of vesicles

In early cases of rickettsialpox, before the rash appears and when atypical mononuclear cells are present in the blood smear, infectious mononucleosis may be suspected The brief persistence of these cells, the negative heterophile agglutinin test, and the ultimate appearance of the rash are helpful differential criteria

Other rickettsial infections to be distinguished are murine typhus and Rocky Mountain spotted fever In neither is there a primary lesion, the rash is never vesicular, and in both the Weil-Felix test with Proteus OX19 is usually positive It should be pointed out, however, that one of our cases of rickettsialpox had no detectable primary lesion and exhibited a nonvesicular rash indistinguishable from that seen in murine typhus The Weil-Felix test was negative, however, and the complement fixation test was positive in convalescence with rickettsialpox antigen

In the last analysis, the definitive diagnosis of rickettsialpox rests on the demonstration of the specific immune response or the recovery of the causative agent

Treatment

Since rickettsialpox is a nonfatal disease, the only form of therapy required is for the relief of symptoms Certain antibiotics, including streptomycin and chloromycetin have been shown to exercise a rickettsiostatic effect in chick embryos and experimental animals [9 10] We have treated one case of rickettsialpox with streptomycin in a patient who acquired the infection in the laboratory The drug was started immediately upon the appearance of symptoms but, in doses of 2 0 Gm. every twenty-four hours, did not appear to modify the disease

Summary

Rickettsialpox is apparently a new disease as yet confined to New York City The clinical and laboratory features of the infection have been discussed, together with means for specific serologic diagnosis and recovery of the causative agent, Rickettsia akari

Discussion

John K Miller, M D , *Albany* —Since rickettsialpox is the most recently recognized member of the group of arthropod-transmitted diseases incited by rickettsiae, it is of interest to determine its present place in the epidemiologic scheme of these diseases

In the "typical epidemic series," Baker conceives of arthropod-borne diseases as originating in an arthropod, developing in a series of steps which eventually reach their climax in epidemic form and then regressing to possible extinction [1] According to Burnet, the first stage is probably a colonization of the arthropod gut by saprophytic agents, some of which exploit their opportunities and begin to derive their nutriment from the living cells rather than from the content of the gut [2] The agent then comes to equilibrium with the host and lives as a symbiont (Class 1) The potential pathogenicity of the agent, however, is maintained and can be activated if it comes into association with the living cells of another organism, which may occur when the arthropod obtains a blood meal Thus the disease in animals, Class 2 in the series, is accomplished An example is the rat flea with its host in murine typhus The disease may be almost or entirely subclinical in the rat host and the rickettsial infection harmless to the arthropod

The third step (Class 3) is the establishment of the human endemic disease, as in endemic typhus Man is usually an accidental host of arthropods A reservoir of the disease is maintained by passage back and forth between the vector and its lower mammalian host, or if the agent is hereditarily transmitted by the arthropod, the vector alone is all that is necessary for a reservoir

When the etiologic agent involves a new host, arthropods other than the original may become transmitters In the case of typhus fever, Baker conceives of the flea as the primary vector and the rat as the primary host When man becomes a secondary host, an arthropod closely associated with him, the louse, becomes the secondary vector Thus Class 4 is reached With the appearance of a secondary vector, the primary vector and host, i e , flea and rat, may drop out of the cycle, and the disease is characterized by a specialized reversible transmission between the secondary host-vector combination, such as man and his lice This constitutes the classic epidemic typhus (Class 5), in contrast to the endemic form in which the main interchange of rickettsiae is between flea and rat, with man being sporadically infected by the flea In the secondary arthropod vector, the biologic equilibrium obtained between the primary vector and the pathogenic agent may not be attained For example, by long transfer from man to louse to man, the classic strain in Europe loses its tendency to follow the rat-flea cycle, and the man-louse cycle operates alone The rickettsiae, however, overwhelm the louse, which dies in about ten days Thus, Baker believes that the secondary arthropod may disappear from the cycle, leaving the disease lying dormant in a human reservoir in which late but mild recrudescences may occur such as Brill's disease (Class 6) [3]

In Class 4 the cycle may become very complex, as in Australian Q fever contracted in abattoirs The rickettsiae in their natural vector, Haemaphysalis humerosa, are transmitted to the bandicoot host carrying also the tick Ixodes holocyclus This latter arthropod transmits the etiologic agent to cattle, which are also infested with a third arthropod, Boophilus annulatus It is the rickettsiae-infected feces of the Boophilus tick which contaminate the dust in the hides, which is the source of human infections

Where is rickettsialpox in this scheme? At present it seems to be in Class 3. The primary arthropod is the mouse mite the primary host, the mouse and man is accidentally the secondary host through association with the mice Further study may reveal secondary arthropod vectors. If such vectors for example the louse are closely associated with man, the disease may move into subsequent stages of the epidemic cycle

[1] Baker A. C.: Am. J Trop. Med. 23: 559 (1943)
[2] Burnet, F M: M J Australia 2: 129 (1942)
[3] Zinsser H.: Am. J Hyg. 20: 513 (1934)

References

1 Huebner R. J Stamps P and Armstrong C: Pub. Health Rep 61: 1605 (1946)
2. Huebner R. J Jellison W L. and Pomerantz C. Pub. Health Rep. 61 1677 (1946)
3 Huebner R. J., Jellison, W L. and Armstrong, C. Pub. Health Rep. 62: 777 (1947)
4 Sussman L. N New York Med. 2: 27, 1946.
5. Shankman, B.: New York State J Med 46: 2156 (1946)
6. Greenberg, M Pellitteri, O Klein, L F and Huebner, R. J: J A.M.A. 133: 901 (1947)
7 Greenberg, M. and Pellitteri, O Bull. New York Acad. Med. 23: 338 (1947)
8. Greenberg M. Personal communication.
9 Smadel, J E., Jackson, E. B. and Gould, R. L.: J Immunol. 57: 273 (1947)
10. Smadel J E. and Jackson, E. B. Science 106 418 (1947)

RADIO-ISOTOPES CANCER AID

Exploding atoms are among science s greatest hopes today in the fight against cancer Just as radium and the surgeon s knife can be used to destroy some malignant tissue that is cancer, so radioactive elements resulting from the processes of the atomic bomb can be used to wipe out some malig nant growths.

Iodine, gold, and cobalt in radioactive forms are the most promising of the potential anticancer radioisotopes.

No scientist would be foolhardy enough—or cruel enough to cancer victims—to hold out too much hope in individual cases Nevertheless, the years of human life to be saved by future applications of radio-isotopes promise to compensate many times over the loss of human life due to use of the atomic bomb in warfare—if the world can arrange not to use the atomic bomb as a weapon in the future.

When the cancer is in the thyroid gland, radioiodine is used as a means of diagnosis and often as treatment. The thyroid gland picks up and utilizes nearly all of the iodine in the human system nor mally about 80 times as much as any other tissue.

When the uranium atom splits up—fission, it is called—as it does in the atomic bomb and in the more peaceful chainreacting uranium pile, one of the many elements formed is a special kind of iodine with a weight 131 times the mass of the hydrogen atom This special fission-made iodine gives off powerful gamma rays, like radium does It can therefore destroy human tissue if it can get at it. Since it is attracted to thyroid tissue, it can be used to destroy it, whether or not it is diseased. Separate out this particular kind of iodine from all the many products of uranium fission as the Atomic Energy Commission does at Oak Ridge Tennessee feed it to the patient and the radio-iodine will go to the thyroid and do its work. Fortunately, this kind of radio-iodine is relatively short-lived, half of it losing its activity in eight days. So it is relatively safe to use since it will not go on with its lethal bombardments when they are no longer needed.

For treating overactive thyroid glands a condition known as toxic goiter, radio-iodine has been very successful. The Mayo Clinic reports success in 80 per cent of the cases treated. Radio-iodine also helps to diagnose the disordered thyroid, whether it is overactive, underactive or cancerous. It is also used as a tracer to locate the deposits of thyroid cancer tissue in various parts of the body far removed from the parent growth—metastases they are called.

The results of treatment of thyroid cancer with radio-iodine have not been nearly so satisfying as the treatment of toxic goiter The latest report of the Atomic Energy Commission explains that malig nant thyroid tissue often does not pick up as much of the radioactive iodine as does the normal thyroid tissue. Much research is underway some of it very promising particularly attempts to put the radioiodine in organic compounds that will be selectively absorbed by cancerous tissues

At the Sloan-Kettering Institute for Cancer Research in New York, animal experiments are testing whether natural antibodies can be made to carry radio-iodine to special parts of the body such as the liver and kidney, there to administer strong doses of radioactivity

The metal cobalt when irradiated in the Oak Ridge pile omits radiations similar to those of radium Since it can be made inexpensively and fabricated into special applicators it will come into general use for cancer treatment when handling and dosage are worked out.

The radioactive form of phosphorus is being used to treat leukemia a cancerous condition of an excess of white corpuscles in the blood and results are as effective as x-ray therapy without causing uncomfortable radiation sickness. This use is based upon the fact that phosphorus concentrates in the blood producing centers.

Treatment of cancer by radio-isotopes is still in its early stages Much more must be learned about basic bodily processes generally and specifically what molecules concentrate in diseased body tissues and can therefore carry to them the exploding atoms that can blast out the disease.

Science has had ample supplies of radio-isotopes for only a short time as scientific progress goes. The first shipment of a radio-isotope was made from Oak Ridge just two years ago (August 2) and it was radiocarbon 14, a substance that Massachusetts General Hospital research hints may be absorbed rapidly by diseased tissue when it is incorporated in protein compounds.—*Science News Letter August 14, 1948*

AN EVALUATION OF THE PRESENT STATUS OF ANTIHISTAMINIC SUBSTANCES

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THE phenomenon of anaphylactic hypersensitiveness was recognized first about a century ago [1] It was not until some fifty years later, however, that investigators became curious and actually interested in the condition as a result, largely, of the observations of Portier and Richet, Arthus, von Pirquet and Schick, Otto, and of Rosenau and Anderson [2–6] In his search for that protein poison, which was generally hypothesized as being responsible for the condition, Dale noted in 1912 that the specific reaction of sensitized muscle to its antigen was identical in every respect to the effect produced by exposure of nonsensitized muscle to histamine, a substance which had been known for some time but which was only isolated from ergot by Barger and Dale in 1911 [7–9] Histamine, an amine of relatively simple form, has since been the subject of intensive study [10] Best, Dale, Dudley, and Thorpe showed that various normal tissues contained loosely combined histamine and that there was a sufficient amount in unstriped muscle to cause a typical anaphylactic contraction in that muscle upon its liberation [11 12] Code has demonstrated that most of the normal blood histamine is in the white cells, while he and Dragstedt and Gebauer-Fuelnegg have shown that a histamine-like substance is present in the blood of the lower animal during anaphylaxis [13,14] From these observations and those of very many others, it seems certain that histamine is closely linked with the phenomena of sensitization in the lower animal and plays an important role in anaphylaxis

In 1927 Lewis and his coworkers focused attention sharply upon the importance of histamine in the human [15] These investigators were able to show that the wheal experimentally produced in the human skin following cell injury was due to the liberation of a loosely combined substance which could not be differentiated from histamine According to the theory of Lewis, the union of antigen and antibody in sensitized tissues causes the liberation of the histamine normally present there, and that, through tissue injury, the histamine thus released produces phenomena characteristic of the allergic reaction or of anaphylactic shock

The opinion favoring the idea that histamine is an important agent in the allergic conditions of man rests largely on the theories and findings of Lewis and his associates Actually, the evidence is circumstantial The literature on the subject is conflicting and confusing It ranges from reports upon the efficacy of histamine itself as a therapeutic agent to the description of sundry attempts to identify it as important or vital to the hypersensitive reaction in man Despite these efforts, it is the data upon the linkage of histamine with anaphylaxis, rather than the data on any proved linkage with allergy in man, that has led to the development and to the application of antihistaminic therapy as a countermeasure in human sensitization Such therapeutic measures against histamine have developed along the following lines

1 Attempts have been made to increase the individual's tolerance to histamine by subjecting him to repeated, increasing doses, usually administered by hypodermic injection, of histamine itself, a weak antigen, or of histamine linked with a protein such as casein or serum globulin of the horse or cow [16] Such histamine-azoprotein has been regarded as having an antigenic potency greater than that of histamine [17]

2 Clinical use has been made of an antihistamine enzyme, histaminase, whose behavior in the test tube encouraged the idea that it would prove effective in neutralizing histamine in the body [18–21]

3 The clinical use of synthetic chemical compounds or antihistaminic substances which have been shown to prevent anaphylactic activity in the lower animal by rendering the histamine ineffective, displacing (or replacing) it at its site of reaction

The efforts at improving allergic symptoms by increasing histamine tolerance by injections of histamine itself or histamine-azoprotein in series have not been very successful, while the attempts to destroy or alter histamine by the administration of the enzyme, histaminase, have been discouraging [22–28] Indeed the American Medical Association, through its Council on Pharmacy and Chemistry, stated in 1940 that histaminase possessed too little clinical value to warrant inclusion in the "New and Nonofficial Remedies" [29]

More successful has been the effect of the

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TABLE 1.—THERAPEUTIC EFFECTS OF ANTIHISTAMINIC DRUGS

Antihistaminic Agent	Hay Fever				Vasomotor Rhinitis				Asthma				Urticaria			
	No. of Cases	Improved	Unimproved	% Benefited	No. of Cases	Improved	Unimproved	% Benefited	No. of Cases	Improved	Unimproved	% Benefited	No. of Cases	Improved	Unimproved	% Benefited
Benadryl	308	204	104	66	90	39	57	41	255	114	143	45	62	54	8	87
Pyribenzamin	1,237	809	428	65	335	182	153	54	510	133	377	26	403	323	80	80
Neo-Antergan	60	39	21	65	10	8			5	1						
Hydryllin	790	538	252	68	130	6	68	42	623	339	284	54	24	12	12	50
Trimeton	166	124	42	75	43	31	12	40	25	11	14		4	4		

oral administration of antihistaminic substances which have the characteristic competitive effect of displacing or replacing histamine by attachment to the cell receptor Earlier known compounds with antihistaminic effect were ineffective or toxic These were the amino acids, arginine histidine, cysteine, and the phenolic ethers [20] The preparations used at present, characterized by an ethylene-diamine radical, have the following features

1 They act as counter agents against histamine in several principal ways

(*a*) They will protect the normal guinea pig against lethal shock which would otherwise follow the injection of histamine

(*b*) They will protect the anaphylactic guinea pig against lethal shock which would otherwise follow the injection of the specific antigen

(*c*) They will diminish the activity of wheal production from histamine peptone, morphine, and atropine in normal human skin [21]

(*d*) They will diminish the activity of wheal production on introduction of the specific allergenic substance in allergic human skin.

(*e*) They will often reduce the swelling and congestion in many allergic disorders, such as nasal edema in hayfever, bronchial edema in asthma, and cutaneous and subcutaneous edema in urticaria.

2 They often have a local anesthetic effect.[21,22]

3 They are relatively nontoxic but frequently do produce symptoms of drowsiness lassitude, nervousness, and insomnia even in small doses

Among the antihistaminic drugs which have been most intensively studied are Benadryl (Parke Davis & Co), Pyribenzamine (Ciba) Neo-Antergan (Merck) Hydryllin (Searle), and Trimeton (Schering) *

Clinical Value

Obviously, any prompt clinical evaluation of a new drug on a large scale is most difficult. The differences in the investigational methods of various workers, the presence or absence of controls, the use of the preparation under study alone or with other medications, the evaluation of the patients' symptoms after treatment, all these factors complicate the process In the data presented here, however, these faults, although present have been somewhat minimized, since the figures were obtained largely through the efforts of a single agency the Committee on Therapy of the American Academy of Allergy (Table 1) [23] Standardized forms of investigation and reporting were used by approximately 75 physicians who were requested to study the effects of these drugs Benadryl was not included in the study of the Academy since it had been previously investigated by a great number of independent workers the findings of many of these investigators have been assembled in this article [24-29]

Hay Fever —In a series of 2 500 hay fever cases treated with the various antihistaminic drugs, from 60 to 75 per cent showed much improvement, the greatest degree occurring apparently in those with a slight or average pollen sensitiveness who were also undergoing pollen therapy The alleviating effects often were noticeable within a half hour of administration of the dose Many patients who received no pollen therapy but relied wholly on the drug obtained a good result. Patients with a high degree of pollen sensitiveness often obtained disappointing results Since there is no prolonged protection from these drugs the doses must be repeated two to four times daily from the onset of the pollen season until the end. Unpleasant effects of vertigo lassitude headache, and intestinal disturbances may prevent such extended treatment.

The antihistaminic drugs should not be used in an attempt to control the general or constitutional reaction resulting from overdosage in pollen therapy Epinephrine with its prompt and decisive effect is always indicated in such situations

Vasomotor Rhinitis —In a series of 614 cases of vasomotor rhinitis about 50 per cent were benefited These figures are lower than for those of hay fever since while hay fever is a single allergic

* This by no means comprises the present list of antihistaminic drugs. Since the completion of this study others have been made available commercially and there will be more.

entity being the result of pollen allergy, vasomotor rhinitis may be due to a multiplicity of causes such as airborne substances (dusts, animal danders, and vegetable powders), foods, drugs, bacterial sensitizations, and endocrine and metabolic disturbances The congestion of acute upper respiratory infections usually does not seem to respond to antihistaminic therapy, although there are occasional exceptions to the rule

Bronchial Asthma —In a series of 1,418 cases of bronchial asthma, 35 per cent reported an appreciable degree of improvement from the use of the antihistamines In many instances the drug was not used continuously, as in the cases of hay fever, but during or at the onset of attacks and in conjunction with other therapeutic measures In this series many allergies were probably of a bacterial type with pathologic intractable features which could not be expected to respond satisfactorily to the antihistamines No opportunity was offered for the classification of this group into the several clinical types of bronchial asthma, a step necessary for any accurate evaluation

In some instances, asthmatic patients given these drugs complain of a "drying effect" upon the respiratory membranes and seem to have an aggravation of the asthmatic symptoms following their use

Urticaria —Urticaria seems to be the clinical condition in which the antihistaminic drugs prove most useful, the cases benefited numbering 80 per cent in a series of 493 studied The acute cases obtain the greatest relief, but it must be remembered that in many instances the symptoms of urticaria are self-limited and disappear, regardless of the type of treatment Among the chronic cases where more complicated causes may be responsible for the symptoms, as endocrine disorders or chronic infections, the results are less satisfactory

The antihistaminic drugs have been found useful in pruritis ani and the pruritis of serum sickness and contact dermatitis [40] While the itching of poison ivy dermatitis may often be successfully controlled, the vesiculation is not lessened In the experimental animal, however, the development of the skin lesions of contact dermatitis has been successfully checked by local use of the drug [41] The antihistamines seem to be of little value in flexural eczema or neurodermatitis, except for relief of the itching [40] Physical allergies due to hypersensitivity to heat, cold, and sunlight often respond to treatment with these drugs [42 43]

Conflicting reports are given of their value in the treatment of migraine, gastrointestinal, and food allergies As yet, insufficient data has been obtained in these conditions

Dosage

These drugs are supplied in capsule or in tablet form for the adult and usually in an elixir vehicle for children The adult single oral dose is 25 and/or 50 mg , to be given preferably after meals The dosage for children is one half of this amount The dosage often may be doubled or tripled The unpleasant side-effects may effectively limit the amount of increase Antihistamines may be used locally for itching, 2 to 3 per cent in a water soluble or in an ointment base [44,45] Parenterally by injection, they are irritating, although they are used this way at times [40] Benadryl has been employed intravenously for migraine, and urticaria and is being studied for its effectiveness in aerosol form [39 40,46]

The antihistaminic drugs are offered as palliatives, they are in no sense curative Their great value is in the temporary relief of swelling and itching They develop no specific immunity for the patient They are unable, for instance, in the hay fever patient to replace immunizing pollen therapy Nor is their influence so sufficiently prompt or effective as to replace epinephrine in emergencies Even in moderate or severe allergic attacks, they are often less satisfactory than epinephrine or ephedrine

Side-Effects

The unpleasant associated effects mentioned, such as dizziness, lethargy, weakness, headache, stimulation, insomnia, and gastrointestinal disturbances, occur in approximately one third of all cases There seems to be great variation in individual effect, one commercial brand causing stimulation and another sedation in the same person In the next case, the effects may be reversed The dosage necessary to produce the effect also varies with the individual, in some it is so small as to discourage further use The majority of patients, however, overcome a part of the unpleasant effect by persistence In some apprehensive patients, the relaxing and somniferous effect may prove desirable

The antihistamines should not be employed without proper supervision A lad recently seen had become the object of concern to his high-school principal as well as his parents because of the gradual conversion of his ambition and interest in his studies into poor scholarship and indifference It was found that the parents had continued the regular and intensive use for his asthma of an antihistaminic drug advised by a physician deceased for more than a year No permanent harm apparently resulted, and within a week of discontinuing the drug the boy's original interests had returned

Summary

In summary it may be said that the anti-

histamine drugs have proved to be most helpful agents against those allergies whose symptoms result from sudden and acute edemas and against many forms of pruritis They are not intended to replace specific immunizing procedures, except possibly in the mildest of cases They are not intended to replace epinephrine or ephedrine. The chief criticism today against their use is the unpleasant side-effects—a criticism which promises to be lessened with the continued improvement in their manufacture.

Discussion

George F Koepf, *Buffalo*—Dr Spain and Dr Pflum have carefully pointed out the benefits as well as the harmful side-effects of many compounds with antihistaminic activity Judging from their review, it appears that these substances have been unusually successful in the control of the symptoms in many allergic disorders. This indicates that histamine plays an important role in the causation of allergic symptoms. However the fact that all allergic disorders do not disappear in all patients suggests that the role of histamine in the production of allergic manifestations may vary from patient to patient and from shock organ to shock organ The side-effects mentioned by the authors must be borne in mind and their evidence indicates that the benefits overbalance in most cases the harmful effects of the antihistaminic substances used clinically to date. Nevertheless the appearance of a potent but less toxic antihistaminic substance would be welcomed by the clinician

Two factors should be stressed in order to obtain equivalent or better effects First, the dosage must be carefully regulated before discarding the drug as useless In the absence of side-effects, the patient with a severe allergic manifestation who fails to respond to the usual amount of drug may respond to larger doses. For example in several cases of severe penicillin sensitivity with a marked generalized urticaria and joint pain and tenderness we have found it necessary to administer as much as 1 400 mg of pyribenzamine per day to obtain relief The premature abandonment of the drug would have resulted in failure in these cases.

Second, Dr Spain has pointed out that in the series of drugs studied, Hydryllin is the most beneficial for asthmatics. This may be due to a synergism involving benadryl and aminophyllin the two components of Hydryllin Experimental work has shown that such a synergism exists between pyribenzamine and ephedrine and between pyribenzamine and aminophyllin More recently Stavraky has also shown that certain iron salts may potentiate the effect of antihistaminic agents

References

1. Magendie, cited by Morgenroth, O: Ehrlich a gesammelte Arbeiter New York, Wiley and Sons 1906 p. 832
2. Portier, P and Richet, C.: Compt. rend. Soc. de biol. 54: 170 (Feb. 15) 1902
3. Arthus, M.: *ibid* 55: 817 (June) 1903.
4. von Pirquet, C., and Shick B. Die Serumkrankheit, Deuticke Leipzig and Wien, 1905.
5. Otto R.: München med. Wehnschr 54: 1665 (Aug. 20) 1907
6. Rosenau, M J and Anderson J F U.S. Pub. Health Service, Hygiene Lab. Bull. 29 30 (1906)
7. Dale, H. H.: J Pharmacol. & Exper Therap 4: 167 (June) 1913
8. *Ibid.* 4 517 (July) 1913.
9. Barger G and Dale, H H: J Physiol. 41 499 (Jan.) 1911.
10. Topley W W C.: An Outline of Immunity Baltimore, Wm. Wood & Co. 1933, p. 200
11. Best, C H. Dale, H. H. Dudley H W and Thorpe W V: J Physiol 62: 397 (Mar.) 1927
12. Coca, A F Walker M and Thommen A. A.: Asthma and Hay Fever in Theory and Practice Springfield, Illinois Charles C Thomas 1931 p. 7
13. Code C. F: J Physiol. 90: 349 (Aug. 17) 1937
14. Dragstedt C. A and Gebauer Fuelnegg, E.: Am. J Physiol. 102: 512 (Nov) 1932.
15. Lewis, T: The Blood Vessels of the Human Skin and Their Responses, London Shaw and Sons, Ltd. 1927
16. Feil, N Rodney, G and Marshall, D E.: J Immunol. 47: 227 (Sept.) 1943
17. Cohen, M. B. and Friedman, H J J Allergy 14: 195 (Mar.) 1943
18. Best, C. H. J Physiol. 67: 256 (June) 1929
19. Roth G M., and Horton, B T Proc. Staff Meet. Mayo Clin. 12: 129 (Mar. 2) 1937
20. Frank, D E.: New York State J Med 43: 339 (Feb. 15) 1943
21. Knoll A. F and Beinhauer L. G: Arch. Dermat. & Syph. 43: 896 (Nov.) 1940.
22. Ramirez, M. A. and St. George A V: M Rec. 119: 71 (Jan. 16) 1924
23. Mifflet, R. F M Clin North America 15: 237 (July) 1931
24. Ernstene, A. C. and Banks, B. M J A.M A. 100 328 (Feb. 4) 1933.
25. Horton B T McLean A R, and Craig, W M.: Proc. Staff Meet. Mayo Clin. 14 257 (Apr. 26) 1939
26. Butler, S. and Thomas W A.: J.A.M.A. 128: 173 (May 19) 1945.
27. Hebald S. Cooke, R. A. and Downing, L.: J Allergy 18: 13 (Jan.) 1947.
28. Dundy H D Zohn, B. and Chobot, R.: *ibid.* 18: 1 (Jan.) 1947
29. Council on Pharmacy and Chemistry J.A.M.A. 115 1019 (1940)
30. Feinberg, S. M: *ibid.* 132: 702 (Nov 23) 1946.
31. Friedlander S. and Feinberg, S. M. J Allergy 17: 129 (May) 1946
32. Leavitt, M. D Jr. and Code C F Proc. Soc. Exper Biol. & Med. 65: 33 (May) 1947
33. American Academy of Allergy Report of Committee on Therapy 1947 To be published.
34. Waldbott G L. J Allergy 17 142 (May) 1946.
35. Eyerman, C. H. *ibid.* 17: 210 (July) 1946.
36. Levin S. J *ibid* 17 145 (May) 1946.
37. Koelsche, G A. Prinkman, L. E. and Carryer H M.: *ibid.* 17: 151 (May) 1946.
38. Friedlander S.: Am. J M. Sc. 212: 183 (Aug.) 1946.
39. McEllin, T W, and Horton, B. T: Proc. Staff Meet. Mayo Clin. 20: 417 (Nov 14) 1945
40. Lynch, F W Arch. Dermat. & Syph. 55: 101 (Jan.) 1947
41. Mayer R. L.: J Invest. Dermat. 8: 67 (Feb.) 1947
42. Rubin, L. Baal, P L. and Rothman, S.: *ibid.* 8: 189 (Apr.) 1947
43. Osborne, E. D Jordon, J W, and Rausch, N Y.: Arch. Dermat. & Syph. 55: 309 (Mar.) 1947
44. Parry D. J J Invest. Dermat. 9 95 (Aug.) 1947
45. Sulzberger M. D., and Baer R. L. The 1947 Year book of Dermatology and Syphilology Chicago, Year Book Publishers, 1947 p. 89
46. Feinberg, S. M., Noren B and Feinberg, R. H.: J Allergy 19 2 (Mar.) 1948.

As in osteomyelitis x ray changes in bone tuberculosis occur relatively late —*Exchange*

Many obstetricians routinely x-ray chests in pregnancy and in the puerperium.—*Exchange*

GUIDED LIVER BIOPSY THROUGH LAPAROTOMY INCISION

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THE determination of the presence of distant spread to the liver is of obvious significance in deciding the operability of intra-abdominal neoplasms When laparotomy has been performed through a lower abdominal incision for a lesion of the pelvic viscera, one has to depend upon palpation for the interpretation of the significance of a nodule or nodules felt in the liver This may be deceptive in cases of pre-existing liver pathology or if only a small, solitary, uncharacteristic nodule is palpated. Under such circumstances, it would be of great help if a definitive biopsy of a liver nodule could be taken Yet, without extending the incision to an unwise degree this cannot ordinarily be done, and even when extended, it would probably be impossible to visualize for direct biopsy a nodule situated on the liver dome Confronted with such a situation recently, a simple device was utilized which enabled an adequate biopsy of the lesion in question to be effected

Case Report

E M , a man of seventy-seven, was admitted to Mt Sinai Hospital on September 17, 1947, with a history suggestive of incomplete large bowel obstruction Until three months prior to admission he had been in good health. At that time he became constipated, and what stools he had were loose and watery One month before admission, anorexia developed For eight days he had not had an adequate bowel movement although some flatus had been passed There had been no nausea or vomiting, but his abdomen, he stated, was somewhat larger than it had been previously Forty pounds had been lost in the last year There was a previous history of an appendectomy twenty years ago, followed by evisceration and secondary suture. Eighteen years ago an upper abdominal operation, the nature of which was not entirely clear, was performed As far as the patient could remember, some sort of epigastric tumor was removed

Examination revealed a moderately distended abdomen without palpable masses There was no tenderness There was a midline epigastric scar with an incisional hernia in it, and there were two right lower quadrant scars On rectal examination, at the tip of the examining finger anteriorly, there was the suggestion of a mass thought to be palpated through the rectal wall, as though a sigmoidal lesion had prolapsed into the cul-de-sac The remainder of the physical examination was of no significance. A flat plate of the abdomen showed moderate distention of the large bowel proximal to the rectosigmoid

An enema and colonic irrigation were immediately effective so that further study was undertaken Sigmoidoscopy showed a polypoid friable stenosing lesion occupying the anterior wall of the rectosigmoid, beginning 11 cm. from the anal margin Biopsy of this lesion showed fragments of colonic mucosa with severe acute inflammation and lymph channels filled with carcinoma cells

The patient was prepared for operation by cathartics, daily enemas and colonic irrigations, a low residue diet, sulfasuxidine by mouth, and various supportive measures, including parenteral fluids and vitamins, iron, and blood. After ten days of this preparation he was considered ready for resection.

Laparotomy was performed on September 27, 1947 The abdomen was opened through a left lower rectus, muscle-splitting incision. It was found that despite the extensive preoperative preparation the large bowel was still quite distended Apparently, a moderate degree of subacute obstruction persisted Resection at this stage was, of course, out of the question, and it was decided to perform a decompressing colostomy as a preliminary procedure However, exploration to determine future operability was made. Locally, an extensive lesion was found The rectosigmoid was the seat of a hard mass and was firmly baked into the bladder anteriorly and the other adjacent parietes No peritoneal implants were seen, and there was no gross evidence of spread to the regional lymph nodes Whether the reaction surrounding the local lesion represented inflammation solely or was comprised of carcinomatous infiltration in addition could not be determined It was felt, though, that preliminary colostomy drainage would permit whatever inflammation existed to subside, allowing resection at a later date if no distant metastases were present Accordingly, the liver was palpated This offered some difficulty because of adhesions of the abdominal contents to the anterior parietal peritoneum at the previous operative sites However, these were penetrated bluntly and the liver examined The left lobe of the liver was found to be free On the dome of the right lobe of the liver a single firm area was felt This was thought to be a metastasis but was not absolutely characteristic and, therefore, could not definitely be described as such. Since future management depended upon the nature of this liver nodule, it was important that definite information concerning it be acquired. Formal biopsy was out of the question through the incision that had been made, and naturally it was preferable to avoid making a second incision in the right upper quadrant for this purpose Actually, even through a right upper quadrant incision, biopsy would have been difficult because of the location of the lesion on the dome of the liver Accordingly, the following device was utilized in an effort to procure a biopsy

While one hand remained in the abdomen over the dome of the liver, an aspirating needle was intro-

duced through the right lower chest wall at the level suggested by the position of the fingers on the liver nodule. The fingers within the abdomen then guided the needle into the lesion The lesion was aspirated, and examination showed that a satisfactory piece of tissue had been obtained A piece of gelfoam was then introduced into the abdomen and placed on the aspiration site in order to prevent bleeding

The operation was completed by making a loop transverse colostomy over a glass rod through a separate supra-umbilical left rectus transverse incision The major incision was closed in layers

The biopsy proved to be satisfactory Histologic study revealed "fragments of liver tissue infiltrated by adenocarcinoma.' The colostomy was made permanent by dividing it completely across. The patient was discharged from the hospital on October 15 1947, in satisfactory condition with a functioning colostomy

Comment

The procedure described in the case report above presents a device by means of which a selective liver biopsy may be obtained once the abdomen has been opened, even though the abdominal incision is too far distant for direct biopsy under vision This is effected by guiding into a palpated liver lesion an aspirating needle introduced through the upper abdominal or lower chest wall, a hand inserted into the abdomen through the original incision serving as the guide. Such a procedure may be found useful on the various occasions that palpatory findings are not clear The true nature of pathology felt in the liver may be determined in this manner with relative assurance that the selected area is being sampled definitively In some cases this may have considerable value prognostically and in determining whether further surgery is indicated

Summary

A method is described for obtaining a selective liver biopsy by guided aspiration once the abdomen has been opened, notwithstanding an incision too distant to permit direct sampling under vision

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SCHOLARSHIPS AWARDED FOR STUDY OF CEREBRAL PALSY

Eight physicians, surgeons, and therapists have been awarded scholarships for specialized training in cerebral palsy by the National Society for Crippled Children and Adults, Inc. This is the first national scholarship program established to meet the challenge of a crippling condition that disables some half million Americans, the Society stated.

Lawrence J Linck the Society's executive director, revealed that the scholarships were made possible under the first of six $5 000 yearly grants from Alpha Chi Omega, national women s sorority, which has adopted help to the cerebral palsied as its major national altruistic project. The scholarships will help meet the *acute shortage of specialists trained in* cerebral palsy a disability of muscular control which results from damage to control centers in the brain.

The first eight recipients are Arline F Bovee, Mukilteo Washington, Miriam Bunce, Denver, Colorado, Dr Harriet E. Gillette, Decatur, Georgia Dr Stanford F Hartman, Phoenix, Arizona, Bette Redwine, Albuquerque, New Mexico Dr Louis Spekter, Hartford Connecticut Joan A. Schauble Seattle, Washington and Dr Harold Westlake, Wilmette, Illinois.

The scholarships cover study at the Children s Rehabilitation Institute Cockeysville, Maryland, under supervision of the Institute s director Dr Winthrop M Phelps. Dr Phelps, internationally recognized authority on cerebral palsy, is also president of the American Academy for Cerebral Palsy and chairman of the National Society's Medical Advisory Council on Cerebral Palsy

The National Society whose services to all types of handicapped persons is made possible by the *annual sale of Easter Seals*, is the only agency conducting a nation wide program on behalf of the cerebral palsied. The recipients of the new scholarships will assist the Society's 2 000 state and local affiliates in expanding cerebral palsy facilities and research through hospital diagnostic and treatment clinics nursery schools for cerebral palsied children treatment centers, and special education and recreation projects.

SELECTION OF HYPERTENSIVE PATIENTS FOR SYMPATHECTOMY

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SURGICAL sympathectomy for hypertensive disease has had sufficient clinical trial to warrant certain conclusions regarding its applicability It is generally agreed that best results are obtained in patients under fifty years of age, having labile blood pressure, relatively unimpaired cardiac and renal function, and no arteriosclerotic complications Even when these conditions are satisfied, however, an appreciable percentage of the favorable cases remain unimproved or little benefited by surgical intervention On the other hand, dramatic response is occasionally encountered in cases viewed as unfavorable preoperatively

Since this surgical procedure is a major one, carrying a mortality and morbidity, some method is required which will permit the identification of favorable candidates for operation The most widely used laboratory test employed for this purpose is the sodium amytal test introduced by Allen and Adson [1 2] Three grains of this drug are given every hour for three hours, and the blood pressure is measured during this period It was originally hoped that the degree of fall in blood pressure would reflect the postoperative response Unfavorable results have been obtained, however, in many cases in which the test predicted a satisfactory outcome Allen actually found it easier to be accurate in the prediction of poor results than of good ones More recently, Hinton and Lord reported the sodium amytal test as being "a safe and simple method of measuring sympathetic tonus" [3] In general, they considered it to be broadly indicative of the type of postoperative blood pressure result which will be obtained following lumbodorsal sympathectomy Examination of their data, however, indicates that almost half of the subjects of their series who manifested a fair response to the sodium amytal test had a relatively poor result from surgery On the other hand, two out of eight patients with a poor sodium amytal response showed a good postoperative result Grimson has found that it is impossible to determine by this means which patients will receive benefit from operation [4] The writers, from their own experience, also believe that no reliance can be placed upon this procedure [5 6]

The cold-pressor test has been recommended to identify the so-called hyperreactor group of patients, i e , the ones in whom the nervous mechanism is considered largely responsible for the hypertension Inasmuch as almost all hypertensive patients are hyperreactors, the method would appear to be of little value in the problem of selection. Clinically, the test has not been found useful for this purpose

Other tests have been proposed, such as the administration of 1/2-grain doses of sodium nitrite each hour for six hours and the intravenous injection of pentothal sodium, but trial in various clinics has demonstrated the unreliability of these methods Smithwick has for some time employed the pulse pressure as a prognostic criterion [7] The results of sympathectomy are considered to be less favorable when the pulse pressure is high However, since increase of pulse pressure is generally attributed to loss of elasticity of the aorta and its large branches, the question arises as to whether this index of arterial aging is also capable of reflecting the degree of irreversible organic change in the arterioles Some authorities do not consider this to be the case

A valuable and accepted practice in surgery of the autonomic nervous system is the use of diagnostic procaine block prior to operation in an effort to predict postoperative results Several groups have considered that preoperative sympathetic block of this type might be of value in forecasting the outcome of lumbodorsal splanchnicectomy Schwartz and Findley suggested that paravertebral block of the sympathetic ganglia might accomplish this purpose.[8] Theoretically, this procedure would be ideal, but practically, its application is limited, owing to the large number of deep needle injections involved Page and his coworkers suggested that spinal anesthesia might be useful in selecting patients preoperatively by differentiating the "neurogenic" from the "humoral" form of the disease [9] Spinal anesthesia by the usual technic, however, is objectionable because it introduces several factors which might influence blood pressure aside from sympathetic nerve block.[6]

Russek and associates reported their experience with continuous caudal (high caudal block) and lumbar peridural anesthesia in selecting hypertensive patients for sympathectomy [5 6] In a small series of cases they found a close correlation between predicted and postoperative results In their opinion this test appeared to be an aid not only in the problem of selection but also in dictating the extent of sympathectomy

indicated in the individual case They con sidered caudal anesthesia superior to high spinal anesthesia when used for this purpose, because, with the former, muscle tone and respiration are little affected After further experience with a significant number of cases, these authors still consider an efficiently performed caudal test as the most accurate single procedure now available

Recently, Sarnoff and Arrowood have in troduced a method of spinal anesthesia in which there is no loss of motor power or muscle tone [10] Their method, called differential spinal block, is continuous spinal anesthesia in which 0.2 per cent procaine solution is introduced into the subarachnoid space by constant drip Their detailed studies show that with this method, sympathetic nerves are blocked coincident with loss of pain sensation to pinprick. By adjusting the dose, they can produce sympathetic block without interfering with tendon reflexes or muscle tone Tests are under way with differential spinal block to determine how effective it may be in predicting the results of dorsolumbar sym pathectomy

More recently, Etsten and Schwab produced a differential type of block by employing a technic consisting of the intermittent intrathecal in jection of concentrations of procaine ranging from 0.2 to 0 4 per cent over a period of an hour [11] The functional depression of the sympathetic chain was discerned by the measurement of electric skin resistance by means of a dermo meter The results of this test in 24 patients suggested that it may be a valuable prognostic guide to the neurosurgeon.

Temporary block of the sympathetic nervous system through the paranteral administration of tetraethyl ammonium chloride has been em ployed as a means of selection for surgery [12] Inasmuch as this drug causes a blockade of autonomic ganglia, parasympathetic as well as sympathetic, its generalized effect cannot be expected to mimic accurately that of lumbodorsal splanchnicectomy Although some have con sidered this test to be reliable, Page and his co workers have reported it to be of no value in the problem of selection [13]

In summary it may be stated that no test is yet available which will predict the hypertensive patient's postoperative reumbent blood pressure infallibly Although a block anesthesia test will come nearer doing this than any other single procedure, it must be emphasized that the test can foretell only the immediate postoperative result The height of the blood pressure one or more years after sympathectomy is largely de pendent upon sympathetic nerve regeneration and other factors. No test, therefore, can be expected to indicate long range results following operation

References

1. Allen, E. V and Adson, A. W: Ann. Int. Med. 11: 2151 (1938)
2. *Ibid.* 14: 288 (1940).
3. Hinton, J W and Lord J W: New York State J Med 46: 1015 (1946)
4. Grimson, K. S. Kernodle C. E. Jr and Hull, H. C.: J.A.M.A 126 218 (Sept. 23) 1944.
5. Rusak, H. L. Southworth, J L. and Zohman, B L. *Ibid.* 128 1225 (1945)
6. *Ibid* 130: 927 (1946)
7. Smithwick, R. H.: Arch. Surg. 49 180 (Sept.) 1944
8. Schwartz H. G and Findley T: Surgery 14: 207 (Aug.) 1943.
9. Page, I. H., Taylor R. D., Corcoran A C. and Moeller, L.: J.A.M.A. 124: 786 (1944)
10. Sarnoff S. J and Arrowood, J G: Surgery 20: 150 (1946)
11. Etsten, B., and Schwab, W: New York State J Med 47 2098 (1947)
12. Lyons, R. H. Gordon, K. M., Neligh, R. B. Hockler S W., Campbell, K. N., Berry R. L. and Rennick, B R.: Am. J M. Sc. 213: 315 (Mar.) 1947
13. Birchall, R. Taylor R. D., Lowenstein V E. and Page I H *ibid* 213 57 (May) 1947

DR. VAN SLYKE HEADS NATIONAL HEART INSTITUTE

The National Heart Institute was established in August to combat heart disease, the nation s fore most killer Dr Cassius J Van Slyke a 47 year old Public Health Service veteran, was named direc tor

The institute was created by Congress to map a broad program of attack against all types of cardio vascular diseases.

Dr Leonard A. Scheele Surgeon General said the program will include research by the institute s staff, financial aid to outside institutions for research and training, fellowships for individual scientists and Federal grants-in-aid and technical assistance to the states for heart disease services

Dr Van Slyke, former chief of the research grants and fellowships division, will be under the general supervision of Assistant Surgeon General R. E. Dyer in his new post

Case Reports

TUBERCULOUS MENINGITIS COMPLICATED BY PREGNANCY

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A SEARCH of the literature has failed to reveal a case of tuberculous meningitis treated by streptomycin with delivery of a healthy baby and subsequent recovery of the mother Such a case is presented in this report, along with a brief review of the other cases of tuberculous meningitis encountered at Kings County Hospital during the past five years

Of the 66 cases reviewed, there were 36 men and 29 women The average age was twenty-six and seven-tenths years, with the youngest fourteen months and the oldest sixty-seven years

In 36 cases, acid-fast bacilli were found by direct smear of the spinal fluid In the remaining 30 cases, the tubercle bacillus was not found on smear Ten of these were proved at autopsy In the remaining 20, the diagnosis was presumptive, based on the clinical picture and the changes in the spinal fluid

Six cases were treated with streptomycin, and, of this group, the case presented is the only one living at the time of this report Of the sixty not treated with streptomycin, there were no survivors

The average survival period after hospital admission of the untreated cases was 15 6 days, for the patients treated with streptomycin, the time was 66 8 days

Case Report

Mrs M P , aged 24, height 66 inches, weight 110 pounds, a white woman, was admitted to a private hospital in July, 1944, for minimal pulmonary tuberculosis She received supportive therapy and bed rest for four months At the end of this time, she was told that her lungs were well enough for her to return home and be treated by her local physician She spent the following three months in bed at home and was told, after repeated chest x-rays, that she could gradually resume activities

She was followed carefully with roentgenographic studies at the end of one month, three months, and finally at six-month intervals There was no apparent change Her last chest roentgenogram was taken in May, 1947 There were no changes from the previous film.

On May 20, the patient noted headaches and weakness of her lower extremities On May 30, she was admitted to a private hospital following an episode of delirium and emesis

That hospital reported delirium, high fever, neck rigidity, Babinski sign present bilaterally, and other signs of meningeal involvement Spinal tap showed initial pressure, 14 mm. Hg There was the appearance of ground glass The cells showed 150–100 per cent lymphocytes Protein was 57 mg , sugar was 60 mg , chlorides were 472 mg , smear was negative, and pellicle formation was present

She received 4 Gm of streptomycin intramuscularly over a four-day period while at this hospital and then was transferred to Kings County Hospital.

The medical history disclosed the usual childhood diseases In 1938 the patient sustained a fracture of the right ankle, which was treated surgically, leaving an ankylosed joint Menstruation began at 14 years of age with a regular 27-day cycle and three-to-four-day flow Her last menstrual period was January 3, 1947 There was no known tuberculosis in the family

On admission to Kings County Hospital on June 4, 1947, the patient's temperature was 100 F , pulse 90, respirations 20, and blood pressure 110/54. She was fairly comfortable, alert, and cooperative, complaining of headache

Physical Examination —The pupils were equal and active The neck showed tender cervical adenopathy (bilateral) The lungs were clear to percussion and auscultation The heart had a regular sinus rhythm, and was not enlarged to percussion, the sounds were of good quality, and no murmurs were heard The abdomen was soft and flat with no tenderness The uterus was enlarged to the size of a five-month pregnancy The pelvic examination was deferred. The extremities showed generalized increased reflexes with flexion contracture, there was an operative scar on the dorsal aspect of the left foot and a foot drop on the right The neurologic examination disclosed 4 plus nuchal rigidity The Babinski sign was absent bilaterally, while the Kernig sign was negative on the right and one plus on the left The Brudzinski sign was 4 plus

Hospital Course —In view of the history, clinical findings, and report on the spinal fluid, the diagnosis was possible tuberculous meningitis She was treated with 3 Gm of intramuscular streptomycin daily in divided doses Lumbar punctures were performed daily Smears and cultures were made for acid-fast bacilli On the fifth hospital day acid-fast bacilli were found in the spinal fluid by the Board of Health Laboratories After this, 0 2 Gm. of intrathecal streptomycin was given daily, in addition to the established intramuscular dosage No other positive smears or cultures were obtained, although all specimens were sent to both the hospital laboratory and the Board of Health

From the fifth hospital day (when acid-fast bacilli were found and intrathecal streptomycin begun) to the twelfth hospital day, the spinal fluid white blood cell count gradually dropped from a high of 2,000 to about 300 It remained low with slight fluctuations During this period the patient improved clinically

On the fifty-first day the patient appeared clini-

cally well but the spinal fluid white blood cells rose quite sharply to 2 500 (mostly lymphocytes) This demonstrated a more active tubercular process Intrathecal streptomycin was increased to 0 3 Gm. daily with parenteral dose remaining the same On the next day the white cell count had dropped to 250

On the fifty-seventh hospital day the patient complained of headache nausea and pains in both legs radiating downward from hips to below the knees. On the previous night she had experienced some vertigo There was no tinnitus.

After a comfortable day, she suddenly became stuporous on the evening of her sixty fifth hospital day This lasted several hours. The next morning she was alert and cooperative with no subjective complaints. Her neck was supple and only minimal neurologic signs were present.

On the sixty-ninth hospital day the patient became lethargic and complained of headache and emesis. Intrathecal streptomycin was stopped.

On the seventy-second day the patient had been asymptomatic for two days Intrathecal streptomycin was started again at a dosage schedule of 0.3 Gm. once each day

On the seventy fifth hospital day a convulsive seizure developed. It started with twitching of the eyelids, progressed to clonic movements of both upper and lower extremities There was frothing at the nose and mouth. Ten minutes later the patient was comatose and markedly cyanotic with labored respirations. The chest was full of moist rales, predominantly in the upper lung fields. Neurologic examination was unsatisfactory The neck was supple and Babinski sign was absent.

Impression.—Convulsion was probably secondary to meningeal irritation due to intrathecal streptomycin.[1] Intrathecal streptomycin was discontinued. The intramuscular dosage was not changed.

The patient improved rapidly Within a few days she was oriented and comfortable.

On the ninety-seventh hospital day a healthy male child was delivered with the aid of low forceps and under local anesthesia.

The patient has been completely asymptomatic since August 17 The last lumbar puncture performed on December 23 showed only 30 lymphocytes.

Audiometric Examination.—The ears had both drums and canals normal. There was no mastoid tenderness. Hearing according to the Weber test, was lateralized to the left. The Rinne test disclosed that air conduction was greater than bone conduction bilaterally The Schwabach test showed that bone conduction was reduced about one half bilaterally

The vestibular function showed no spontaneous nystagmus Caloric testing with ice water 40 cc in 15 seconds gave no response for either ear

The impression was of impaired hearing and vestibular function central type, caused by basilar meningitis and streptomycin reaction.

Streptomycin levels were spinal fluid high of 31 units per cc. and low of 1 unit per cc., blood a high of 16 units per cc. and a low of 4 units per cc.

Follow-up.—On August 20 1948 eight months after leaving the hospital the patient and baby are living and well

Summary

A case of tuberculous meningitis complicated by pregnancy with the delivery of a healthy infant and clinical arrest of the meningitis, has been presented

A total of 315 Gm. of streptomycin was given intramuscularly over a period of one hundred five days. A total of 15 4 Gm. of streptomycin was given intrathecally over a period of seventy two days

Reference

1 Farrington, Robert F., Hull-Smith, Harriet, Bunn, Paul A., and McDermott, Walsh J A M A. 134: 679 (June 21) 1947

PENICILLIN NAMES BAFFLE DOCTORS

Trade names for penicillin are becoming so numerous and so confusing that even doctors cannot keep up with the terminology according to an editorial in the July 17 issue of the *Journal of the American Medical Association*

Doctors have to contend with such titles as Buffecillin, Duracillin Poultrycillin Dairycillin, Denticillin, Pen-Troche and P O B the editorial says.

The *Journal* protested editorially in 1946 against the multiple names for the product. Now comes procaine penicillin with a variety of titles that fail to indicate the nature of the product and a number of other penicillins named with relation to the section of the body at which they are aimed

The editorial entitled More Silly Names for Penicillin Products follows in part

To select a rose from such a garden would require a botanist with more basic knowledge of the naming of plants than most physicians possess. Perhaps the next step will be numbers to correspond with certain entrances or exits of the human body we may be talking about cillin No 1' for the front and cillin No 2' for the rear

In a previous editorial attention was called to the combination of the manufacturer's name with cillin. Since there were almost 30 manufacturers, that offered almost 30 possibilities Now the emphasis seems to be inclining toward the port of entry plus cillin.

The Council on Pharmacy and Chemistry in recent years has tried to be more than reasonable about the acceptance of fanciful names for widely used products of varying manufacture Even the patience of the proverbial Job would be tried by contemplation of a list such as is here cited

In the previous editorial the editor offered 8 to 5 that doctors would not guess the nature of a product called Penoral. The odds are improving We now offer 5 to 1 on P O B

HEPATITIS DUE TO CINCOPHEN, WITH RECOVERY

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(From the Bellevue Hospital)

THIS case is being reported because it shows several interesting and unusual aspects, the rarity of the disease at this time, the complete discrepancy between the clinicopathologic findings and the laboratory, and a liver biopsy during the course of the disease

[illegible] decades ago, cinchophen poisoning was not uncommon This was to be ascribed to its [illegible] and to the fact that it could [illegible] the counter and was an ingredient [illegible] remedies" [1] Undoubtedly, [illegible] occurred and were not recognized as the causative agent was not suspected or [illegible] 1936, Palmer and Woodall collected cases with 88 deaths of hepatitis associated with cinchophen administration [2] Since [illegible], there were reported [1,3–6] [illegible] there is no [illegible] seven years months [illegible] were found by direct examination of [illegible] In the remaining 30 [illegible] was not found on smear [illegible] at autopsy In the [illegible] was presumptive, based [illegible] changes in the spinal [illegible] streptomycin, and, [illegible] is the only one [illegible] Of the sixty not [illegible] were no survivors [illegible] after hospital admission was 15 6 days, for [illegible] streptomycin, the time [illegible], weight 110 [illegible] to a private [illegible] pulmonary tuberculosis [illegible] therapy and bed [illegible] this time, she [illegible] enough for her [illegible] her local physician [illegible] this in bed at home [illegible] chest x-rays, that she [illegible] with roentgenographic [illegible] with, three months, and [illegible] There was no apparent [illegible] chest roentgenogram was [illegible] There were no changes from [illegible] the patient noted headaches and [illegible] of her lower extremities On May 30, [illegible] was admitted to a private hospital following an [illegible] episode of delirium and emesis.

That hospital reported delirium, high fever, neck rigidity, Babinski sign present bilaterally, and other signs of meningeal involvement. Spinal tap showed initial pressure, 14 mm Hg There was the appearance of ground glass The cells showed 150–100 per cent lymphocytes. Protein was 57 mg , sugar

Examination revealed an elderly white man in no acute distress with moderate icterus of sclerae and skin Blood pressure was 130/75, temperature 98 4 F Head, neck, heart, and lungs were otherwise negative, and the liver and spleen were not palpable A few small hemorrhoids were found on rectal examination, and a bilateral equinovarus deformity was noted The patient was placed at bed rest, and therapy consisted of a high protein, high carbohydrate diet with vitamin and protein supplements and choline, methionine, and vitamin K by mouth On the following day, the icterus index was 60, the cephalin flocculation was negative in forty-eight hours, and the urine was positive for bile but negative for urobilinogen

During the first week at home the patient was fairly comfortable and stable, the only complaint being marked anorexia His stools were consistently light, except for one day when they were dark On occasion the liver edge could be palpated just beneath the costal margin on deep inspiration, but never was there any tenderness The day before admission the jaundice became more intense and the pruritus and anorexia more severe The patient was admitted to the hospital on July 10, 1947

Physical examination revealed 4,170,000 [illegible] blood cells, 13 Gm of hemoglobin, and 10,900 and active blood cells with 70 per cent polymorphoadenopathy (bilateral) The lungs, and 3 per cent percussion and auscultation negative except for 4 regular sinus rhythm, and was not rate was 46 mm. in cussion, the sounds were of good direct, prompt, 18 4 murmurs were heard The abdome[illegible]d as a faint trace in flat with no tenderness The uterus[illegible] to the size of a five-month pregnancy[illegible] eight hours The examination was deferred The extrem[illegible]-globulin ratio generalized increased reflexes with flexio[illegible] units, and a ture, there was an operative scar on t[illegible] serum amylaspect of the left foot and a foot drop on [illegible] subsequent urine The neurologic examination disclose[illegible]sitive in a dilunuchal rigidity The Babinski sign were positive for bilaterally, while the Kernig sign was [illegible] pertinent the right and one plus on the left. The A simple film sign was 4 plus [illegible], and a gastro-

Hospital Course —In view of the history findings, and report on the spinal fluid, [illegible] July 16, 1947, was possible tuberculous meningitis [illegible] the seventy-treated with 3 Gm. of intramuscular [illegible] normal liver function daily in divided doses Lumbar [illegible] on July 19, 1947, performed daily Smears and cul[illegible] second specimen after in- for acid-fast bacilli On the fif[illegible] fast bacilli were found in [illegible] Board of Health Laborat[illegible] of intrathecal streptomyc[illegible] tion to the established [illegible] other positive smears [illegible] although all specimens [illegible] pital laboratory and the

From the fifth hospital [illegible] were found and intrathec[illegible] the twelfth hospital day, [illegible] cell count gradually dropp[illegible] about 300 It remained [illegible] ations During this peri[illegible] clinically

On the fifty-first day th[illegible]

	Albumin-Globulin Ratio	Prothrombin Time Seconds	Alkaline Phosphatase Units
[illegible]tal			
[illegible]ro-			
	1 74	19 9	8 5
		22 0	0 5
	1 09		
	1 33		
	2 40		

stillation of magnesium sulfate and occult blood in all specimens. For two to three days after the duodenal drainage the stools were dark green and then reverted to a light yellow There was a slight temporary drop in the serum bilirubin from 33.6 to 20 7 after this occurrence, but it rose again to as high as 34.6. Subsequent cephalin flocculation tests were never more than a trace in forty-eight hours.

During this period of hospitalization the patient's temperature was always normal, but his course was progressively downhill with increasing weakness, weight loss, anorexia, some upper abdominal distension nausea, and pain. The pruritus was well controlled by synergen at first and then by pyribenzamine in 50-mg. doses.

Inasmuch as the evidence pointed so strongly to an incomplete or intermittent obstructive jaundice, despite the history of cincophen after suitable preparation with blood transfusion and intramuscular vitamin K the patient was operated on under spinal anesthesia on July 30 1947, twenty days after admission and thirty nine days after the onset of his illness. At operation the entire extrahepatic biliary tract, gastrointestinal tract, and pancreas were normal. The liver and spleen were slightly enlarged the former being firm greenish, and finely granular A section of liver was taken for biopsy and was reported by Dr Henry Brody as follows (Fig 1)

Gross examination Three tiny wedges of liver deep brown in color with numbers of gray dots.

Microscopic examination The liver cells are markedly swollen practically obliterating the sinusoids. However there is no destruction of the normal architectural arrangement of the liver cords no necrosis is found Many cells in the liver cords have larger than normal nuclei some are binucleated The cells show little vacuolation they are finely granular Some cells show a central concentration of the granular material. In addition many contain fine greenish-brown pigment granulation. In the central portion of each lobule the bile canaliculi are strikingly distended. Bile is also seen accumulated between liver cells and within Kupfer cells The portal spaces appear compressed There does not appear to be any real increase in portal fibrous tissue The portal areas all show considerable round cell infiltration The portal bile ducts do not appear to be distended, nor do they contain bile pigment

Diagnosis Granular degeneration of liver cells. Central bile stasis.

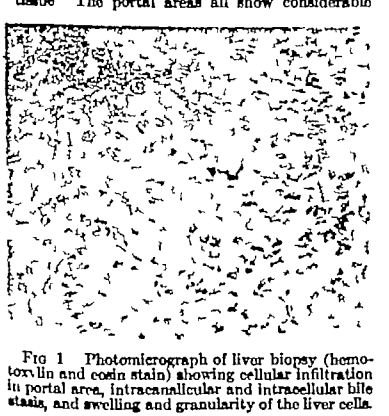


FIG 1 Photomicrograph of liver biopsy (hemotoxylin and eosin stain) showing cellular infiltration in portal area, intracanalicular and intracellular bile stasis, and swelling and granularity of the liver cells.

The patient s immediate postoperative course was good. He was given a continuous intravenous injection of glucose in distilled water and glucose in saline, to which was added daily 1,000 cc. of parenamine, 10 Gm. of methionine parentosol, vitamin K, and ascorbic acid. On the second postoperative day he began to take small amounts of fluid and food by mouth. By the evening of the third postoperative day, he began to have severe nausea and upper abdominal distress, associated with increasing restlessness. He was given codeine and sodium phenobarbital for sedation, but by the following day August 3, 1947 he gradually became semistuporous, disoriented and, at times, violently irrational and hallucinatory His temperature began to rise very gradually up to 101 6 F A sweetish fetid odor (fetor hepaticus) was noted that pervaded the entire room. Blood chemistry at this time revealed no essential change from previous ones, except for considerable lowering of the total protein to 4.32 Gm. with an albumin-globulin ratio of 1 09

Therapy consisted of approximately 4,000 to 5,000 cc. of intravenous fluid daily consisting of 15 per cent glucose in distilled water 10 per cent glucose in saline and 1,000 cc. of parenamine Ten grams of methionine, vitamin B complex, and ascorbic acid were added to the intravenous injection. Twenty to thirty units of insulin were added to each 1 000-cc. flask containing glucose, and 2 cc of crude liver were given intramuscularly daily

The patient was critically ill and almost moribound for twenty four hours when the temperature began to drop and he began to respond slowly Three days later, on August 6 1947, he began to take small amounts of fluid by mouth, but his main intake for about one week was intravenous fluids as above His total intake was kept between 4 000 and 5 000 cc. of fluid daily with a corresponding urinary output. Several transfusions were given during this period. By August 7 1947 he was taking small amounts of food by mouth and was given 5 units of insulin before each meal to stimulate his appetite At this time he still had a low-grade fever with no signs of infection. The penicillin was stopped, and the temperature returned to normal in twelve hours. During the ensuing few days, the infusions were cut down as the patient took more and more by mouth. On August 10 1947, one hour after intravenous parenamine, the patient had a severe chill with a rise in temperature to 103.4 F By August 12, 1947, he was getting only 1 000 cc. of 10 per cent glucose in distilled water with 10 Gm of methionine By the following day all the infusions were stopped. The patient was then taking a full high protein high carbohydrate diet with vitamin and protein supplements methionine choline, and ferrous sulfate by mouth, and 2 cc. of crude liver intramuscularly daily Following surgery his bilirubin gradually dropped to 12.8 mg. per cent. His cephalin flocculation was never more than 2 plus in forty-eight hours and by August 15, 1947 his stools were consistently dark brown and his urine light in color He was discharged from the hospital on August 16 1947, thirty-eight days after admission, to convalesce at home.

Following discharge the patient continued to improve very rapidly in regard to weight, appetite, strength and loss of icterus. He was continued at

bed rest for a while and then gradually allowed to resume activity, so that by September 15, 1947, he was completely ambulatory and by October 1, 1947, he had returned to his business for short periods His jaundice rapidly cleared, by August 21, 1947, it was 0 5 mg per cent, September 6, 1947, 0 25 mg per cent, October 7, 1947, 0 2 mg per cent, and November 6, 1947, 0 2 mg per cent Cephalin flocculation on November 6, 1947, was 1 plus in forty-eight hours During this period of convalescence, the oral medication and supplements and intramuscular crude liver were gradually cut down and were completely eliminated by October 1, 1947, except for vitamin supplements and ferrous sulfate The patient is now well and moderately active in business At present he shows no sequelae

Comment

The most interesting feature of this case is the discrepancy between the clinicopathologic findings and the laboratory findings The impairment of excretory function, manifested by marked jaundice, in contrast to normal metabolic function as evidenced by the cephalin flocculation, the normal cholesterol and esters, the normal total protein and albumin-globulin ratio, negative to normal urine urobilinogens, normal prothrombin times, normal intravenous galactose tolerance test, and the response to duodenal drainage, pointed to an obstructive jaundice

The clinicopathologic findings in this case are quite similar to a series of cases, reported by Watson, of infectious hepatitis of the periacinar or cholangiolitic type which display all the signs and laboratory findings of a severe regurgitation jaundice with little or no evidence of impairment of metabolic liver function [10] Similar findings have been reported in toxic hepatitis due to arsenicals and thiouracil [11 12]

This case again serves to point to the fact that at the present time our battery of available liver function tests are not entirely adequate to detect disturbed liver metabolism, and that in occasional cases more attention must be paid to a significant fact in the history, i e , ingestion of a known hepatotoxic agent, although all the chemical findings point in a different direction In this particular case, as this patient had had severe jaundice for about six weeks and the evidence for obstruction was so strong, it being felt that further delay would not be in the best interest of the patient, laparotomy was done

It is difficult to estimate how large a part the surgical procedure played in the development of the acute hepatic decompensation Judging from the preoperative course, it is highly probable that the sequence of events might have been the same without surgery The intensive parenteral administration of methionine, protein, and glucose undoubtedly contributed to this patient's prompt and apparently complete recovery

Summary

1 A case of hepatitis due to cincophen is presented

2 The inability of the laboratory to demonstrate impairment of liver function in a seriously damaged liver is shown

3 Complete recovery of a patient in acute liver decompensation followed the intensive parenteral administration of methionine, protein, and glucose

References

1 McBryde C M J A M A 114 316 (1940)
2 Palmer, W L and Woodall, P S *ibid.* 107 760 (1934)
3 Lenzner, A R. Lockie, L M , and Becker, C F New England J Med 236 500 (1947)
4 Boros, E. J A.M.A. 109 113 (1937)
5 Doane, J C Rev Gastroenterol. 3 333 (1936)
6 Sugg E S Am. J M Sc. 195 473 (1938)
7 Reichle, H S Arch. Int. Med 44 281 (1929)
8 Gianaiacusa, J E , and Althausen T L. J A.M A 134 589 (1947)
9 Basset, A M , Althausen T L , and Goltrin, G C Am J Digest Dis. 8 432 (1941)
10 Watson, C J and Hoffbauer, F W Ann Int. Med 25 195 (1946)
11 Hanger F M , Jr , and Guttman A B J A M A 115 263 (1940)
12 Cargill, S L., and Lesses, M F *ibid* 127 890 (1945)

ENROLLMENT IN MEDICAL CARE PLANS PASSES EIGHT MILLION MARK

Enrollment in nonprofit prepayment plans for medical care passed the 8,000,000 mark during the second quarter of 1948 The Blue Shield enrollment report for March 31, 1948, covering all nonprofit plans in the nation with medical or Blue Cross sponsorship, revealed a first quarter total of 7,928,128

Although all nonprofit plans were included in the tally, some of the reporting organizations are not known as Blue Shield Plans, or affiliated with Associated Medical Care Plans Blue Shield Plans recorded a total membership of 6,473,439 persons, approximately 80 per cent of the grand total

Total membership gain during the first quarter of 1948 was 645,222 persons, representing a 9 19 per cent increase over December 31, 1947

Michigan Medical Service continues to be the largest Blue Shield Plan in the United States with a total enrollment of 981,729

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NECROLOGY

Edward Joseph Bedell, M D., of Delmar died on September 23 at the age of eighty four Dr Bedell was graduated from Albany Medical College in 1893 and had practiced medicine in Bethlehem for more than fifty years. Dr Bedell retired last year after serving as health officer of the town for twenty years.

Willis S. Cooke, M.D., of Cazenovia, died on September 2 Dr Cooke was graduated from New York University School of Medicine in 1898 and served as a major during World War I He was a retired member of the New York State Compensation Board and had formerly practiced in Otsego and Oneonta.

Paul Dineen M.D , New York died on September 20 He was sixty years old Dr Dineen was graduated from the College of Physicians and Surgeons Columbia University in 1919 and was elected to the national honorary medical society, Alpha Omega Alpha. A first lieutenant during World War I, he received the French *Croix Epidemies* for his service with the 9th Base Hospital in France Director of of the department of medicine of the International Telephone and Telegraph Corporation since 1928, Dr Dineen had taught experimental and clinical surgery at New York Hospital since 1932 He also served as an associate surgeon on the staff of this hospital. In 1946 he was president of the surgical section of the New York Academy of Medicine and was a member of its advisory board until his death. Dr Dineen was a member of the American Medical Association, the New York Academy of Medicine, the New York Surgical Society and the New York State and County Medical Societies.

James Maurice Downey, M.D., died on September 12 at his home in Brooklyn. His age was seventy nine. Dr Downey was graduated from the Long Island College Hospital in 1891 and interned at St. Mary s Hospital Brooklyn. Dr Downey was senior attending surgeon of the Holy Family Hospital, Brooklyn, and a consultant surgeon on the staff of Mercy Hospital, Rockville Centre. An honorary police surgeon former president of the Brooklyn Surgical Society and a fellow of the American College of Surgeons, he was also a member of the American Medical Association, the Brooklyn Surgical Society and the New York State and County Medical Societies.

John William Edwards, M.D , seventy-nine, of Brooklyn, died on September 19 A physician in Brooklyn for more than forty years, Dr Edwards was graduated from the Long Island College Hospital in 1907 and for many years was on the staff of Swedish Hospital, Brooklyn During the Spanish American War Dr Edwards served as hospital steward for the 114th Provisional Regiment and during World War II was chief surgeon of the New York Police Reserves. Dr Williams was a member of the American Medical Association and the New York State and Kings County Medical Societies.

William Christian Hager, M.D., a physician in Brooklyn for more than forty years died on September 12. He was eighty two years old Dr Hager was graduated from the Long Island College Hospital in 1890 He had retired from practice two years ago

Benjamin Kaufman, M D , aged fifty-seven, of Brooklyn, died on June 20 Dr Kaufman was graduated from University and Bellevue Medical College in 1912 and interned at Beth Israel Hospital New York City He served as an associate attending surgeon at Israel Zion Hospital, Brooklyn and was a member of the American Medical Association and the New York State and Kings County Medical Societies.

Louise Hopkins Meeker, M.D , of Scarsdale, died on September 21 at the age of sixty-nine. Dr Meeker was graduated from Boston University School of Medicine in 1906 and served as assistant professor of pathology on the staff of New York Post-Graduate Medical School and as associate attending pathologist in the New York Post-Graduate Hospital and Dispensary from 1917 until her retirement in 1946 Dr Meeker a diplomate of the American Board of Pathology, was a member of the American Medical Association, the American Association of Pathologists and Bacteriologists, the New York Academy of Medicine the New York Pathological Society and the New York State and Westchester County Medical Societies.

Homer W Smith M D., of Rochester died on September 5 He was sixty-three years old. Dr Smith was graduated from the University of Buffalo School of Medicine in 1913 Dr Smith was a former president of Park Avenue Hospital Rochester where he also served as pathological surgeon. He was a physician on the staff of Monroe County Infirmary and a former member of the Rochester Health Bureau. During World War II he was examining physician for Selective Service in Rochester Dr Smith was a member of the American Medical Association, the Rochester Academy of Medicine, and the New York State and Monroe County Medical Societies.

BCG inoculation is worthwhile in tuberculin negative individuals liable to exposure to tuberculosis, but because its protection is only partial, vaccination should be done on an individual basis.—*Exchange*

The average age of patients dying of tuberculosis today is over forty —*Exchange*

Frequent chest colds are suggestive of bronchiectasis.—*Exchange*

MEDICAL NEWS

Appoint Advisory Council on Mental Health

APPOINTMENT of an advisory council to assist the Department of Mental Hygiene in the expansion of the State's mental health program to cope with growing community needs was announced by Dr Frederick MacCurdy, Commissioner of Mental Hygiene, with the approval of Governor Dewey

The council represents various aspects of community activity in the fields of psychiatry, social welfare, general medicine, and public health

The council, which will meet monthly with Dr MacCurdy, conducted its initial meeting September 15 Dr Howard W Potter, professor of psychiatry at the Long Island Medical College, is chairman of the council, other members being Dr Edward A Spar, psychiatrist in private practice and consulting neurologist of Buffalo, Dr S Bernard Wortis, consultant in mental hygiene to the United States Public Health Service and professor of psychiatry at New York University College of Medicine, who represents the New York State Medical Society, Dr J Lawrence Pool, neurosurgeon, Neurological Institute, New York City, Dr L Whittington Gorham, formerly physician-in-chief at Albany Hospital and professor of medicine at Albany Medical College, Marian F McBee, psychiatric social worker and executive secretary of the New York Committee on Mental Hygiene of New York City, Ralph King, president of the New York State County Welfare Association, of Elizabethtown, and Judge Henry J A Collins of the Nassau County Children's Court

Dr MacCurdy said that the council will assist him and his staff in a number of projects, including a more comprehensive educational program to promote the mental health of children and development of plans in cooperation with hospital groups for greater provision for care of mentally ill patients in general hospitals

Facilities for child guidance and mental health clinics will be studied as a step toward amplifying the program for mental health among children The council and the department will study community requests for aid

Examination Announced for Medical Officer Positions

THE United States Civil Service Commission has announced an examination for filling Medical Officer positions in Washington, D C, through the United States, and in the Panama Canal Zone, at salaries ranging from $4,479 to $6,235 a year Positions in the following fields of medicine will be filled from this examination general practice, anesthesia, aviation medicine, bacteriology (medical), cancer, research and diagnosis and treatment, cardiology, dermatology, epidemiology, gynecology, internal medicine and diagnosis, maternal and child health, obstetrics and pediatrics, medical pharmacology, neurology, neuropsychiatry, occupational health and medicine, ophthalmology, otolaryngology, pathology, physical medicine, physiology, psychiatry, public health, general and veneral disease control, roentgenology, surgery—chest, general, orthopedic, and plastic, tuberculosis, urology, administrative medicine, and adjudicative medicine

No written test is required to qualify for the positions Applicants must be graduates of a medical school and must be currently licensed to practice medicine and surgery (The requirement of a current license will be waived for certain persons and positions) For positions paying $4,479 and $5,232, applicants must have completed a full internship, either general rotating or in a specialty (this requirement is waived for some positions), and for positions paying $5,232 and $6,235, they must have had professional medical experience Maximum age limits for these positions are as follows For Panama Canal Service, forty-five years, for Indian Service, fifty years, for other agencies, sixty-two years For persons entitled to veteran preference, the forty-five and fifty-year age limits are waived to sixty-two years and the sixty-two year age limit is waived without limitation

Interested persons may obtain information and application forms from most first and second class post offices, from Civil Service regional offices, or from the U S Civil Service Commission, Washington 25, D C Applications will be accepted in the Commission's Washington office until further notice

Prize Awards for Essays Announced

THE American Goiter Association again offers the Van Meter Prize Award of $300 and two honorable mentions for the best essays submitted concerning original work on problems related to the thyroid gland The award will be made at the annual meeting of the Association which will be held in Madison, Wisconsin, May 26, 27, and 28, 1949, providing essays of sufficient merit are presented in competition

The competing essays may cover either clinical or research investigations, should not exceed 3000 words in length, must be presented in English, and a typewritten double-spaced copy sent to the corresponding secretary, Dr T C Davison, 207 Doctors Building, Atlanta 3, Georgia, not later than March 15, 1949 The committee who will review the manuscripts is composed of men well qualified to judge the merits of the competing essays

A place will be reserved on the program of the annual meeting for presentation of the Prize Award Essay by the author if it is possible for him to attend The essay will be published in the annual proceedings of the Association This will not pre-

vent its further publication, however in any journal selected by the author

The American Urological Association offers an annual award of $1,000 (first prize of $500 second prize $300 and third prize $200) for essays on the result of some clinical or laboratory research in urology Competition shall be limited to urologists who have been in such specific practice for not more than five years and to residents in urology in recognized hospitals.

The first prize essay will appear on the program of the forthcoming meeting of the American Urological Association, to be held at the Biltmore Hotel in Los Angeles May 16 to 19, 1949

For full particulars write the secretary Dr Thomas D Moore, 899 Madison Avenue, Memphis 3, Tennessee Essays must be in his hands before February 15 1949

MEETINGS

PAST

Eastern New York Eye, Ear, Nose and Throat Association

A clinic day, held on October 7, opened the fall activity for the Eastern New York Eye Ear Nose and Throat Association with the group meeting at the Albany Hospital, Albany The evening program included a dinner at the Albany Country Club, followed by an address by Dr Charles J Imperatori on 'Problems Facing the Otolaryngologist.'

New York Council of Surgeons

Dr George Schwartz presented a paper on "Immediate Therapeutic Approach to the Common Cardiac Emergencies at a meeting sponsored by the New York Council of Surgeons, held September 21 at the Parkchester General Hospital, Bronx

At the session on September 28 at the Parkchester General Hospital Dr Harry Wallerstein, hematologist at Jewish Memorial Hospital Brooklyn, spoke on "Management of Erythroblastosis Fetalis"

New York Psychoanalytic Society

The 309th meeting of the New York Psychoanalytic Society was held September 28 in New York City Dr Gustav Bychowski presented a paper on 'Neurotic Obesity' The talk was followed by an executive session.

FUTURE

Syracuse Academy of Medicine

Postgraduate instruction arranged by the Council Committee on Public Health and Education of the State Medical Society, in cooperation with the State Department of Health, will be given for the Syracuse Academy of Medicine on Tuesday night, October 19 at 8 30 P.M. at the University Club Syracuse.

Dr Isadore Snapper clinical professor of medicine at Columbia University, College of Physicians and Surgeons and director of medical education at Mt. Sinai Hospital, New York City, will speak on Osseus Manifestation of Medical Diseases.'

Metropolitan New York Chapter Association of Military Surgeons of the United States

A symposium on "Rehabilitation will be held Wednesday night, October 27 at 8 30 P.M. at the New York University Bellevue Institute of Rehabilitation and Physical Medicine 325 East 38th Street, New York City as the first of the fall meetings of the Metropolitan New York Chapter, Association of Military Surgeons of the United States. The symposium will include a demonstration of 'Dynamic Therapeutics in Chronic Disease.

Program for the symposium includes "Rehabilitation—Its Place in the Practice of Medicine" Dr Howard A. Rusk, director New York University Bellevue Institute of Rehabilitation and Physical Medicine, Rehabilitation—Its Place in the General Hospital, Dr Donald A. Covalt, clinical director of the Institute Some Emotional Factors in Physical Disability' Dr Morris Grayson director of psychiatric research at the Institute and Rehabilitation of Motor Disabilities, Dr George G Deaver professor of clinical rehabilitation and physical medicine New York University College of Medicine with demonstration of patients by Dr Deaver and staff

Inter American Congress on Brucellosis

The second Inter American Congress on Brucellosis will be held from November 17 to 20 in Mendoza, Argentina, and from November 22 to 26 in Buenos Aires. Dr Harold J Harris, New York City will attend the Congress and read a paper on "Recent Advances in the Diagnosis and Treatment of Brucellosis.

Further information may be obtained from the president of the American Committee, Alice Evans 2001 Connecticut Avenue N W Washington D C.

PERSONALITIES

Honored

Dr Lewis X. Fitz Simmons, Pulteney by the Steuben County Medical Society, on his completion of fifty-eight years of active practice.

Awarded

Dr Richard Kovacs New York City the Distinguished Service Key and Citation from the American Congress of Physical Medicine 'in recognition of his contributions to the advancement of the science and art of physical medicine as a writer of outstanding distinction, and particularly as editor of the *Year Book of Physical Medicine*

Appointed

Dr Robert C Berson Rye as assistant dean of

the University of Illinois College of Medicine, and as assistant director of clinics for the University of Illinois hospitals Dr Malcolm A. Bouton, district State health officer, to the post of city health commissioner of Schenectady Dr Herman E Hilleboe, State commissioner of health, as director of the new Department of Preventive Medicine and Public Health, Albany Medical College Dr Ray E Trussell, epidemiologist in the State Health Department, as professor of preventive medicine and public health, Albany Medical College Dr Cornelius H. Traeger, New York City, as medical director of the National Multiple Sclerosis Society

Dr William L Watson, chief surgeon of the Thoracic Surgical Service, Memorial Hospital Center for Cancer and Allied Diseases, New York City, as associate professor of surgery, New York University College of Medicine

Elected

Dr William G Keens, Albany, as grand medecin of the Grand Voiture, 40 and 8 Society of New York.

Speakers

Dr Arthur J Bedell, Albany, a series of three lectures at the meeting of the Pan Pacific Surgical Association in Honolulu, Hawaii, August 30 to September 13 Dr Theodore R Miller, New York City, on "Treatment of Malignant Melanoma and Symptomatology of Gastric Cancer" at the annual meeting of the Utah State Medical Association held in Cedar City, Utah, on September 2, 3, and 4

Dr Bernard Roswit, director of the radio-isotope section of the Veterans Administration Hospital in the Bronx, on "Use of Radio-isotopes in Diagnosis and Treatment of Cancer and Certain Blood Diseases" at a meeting of the Dora Paul Fund for Cancer Research, September 22 in New York City

Dr George T Pack, New York City, on "Recent Advances in the Treatment of Gastrointestinal Cancer" at the meeting of the Montgomery County Medical Society, Silver Spring, Maryland, on September 21

New Officers

Dr Jack F Bailey, Mansfield, Pennsylvania, who was attached to the First Division of the U S Marine Corps during the war and saw extensive service in the Southwest Pacific, general practice in Owego

Dr Charles Friedman, Poughkeepsie, formerly on the surgical staff of the Army General Hospitals in India, general practice in Highland Dr Joseph Isenstead, Sharon Springs, general practice in Palatine Bridge Dr Clyde L Nagle, Navy veteran, general practice in Elmira Dr John B Phillips, battalion surgeon in the European theater during the war, practice of obstetrics and gynecology in Schenectady Dr Charles Lee Sprinkle, former medical officer with the Fleet Marine Corps overseas, practice of internal medicine in Ithaca Dr L J Strobino, Bethel, Connecticut, Army veteran who served as chief of orthopedic service with the 52nd Station Hospital in North Africa and Italy practice of orthopedic and traumatic surgery in Utica

COUNTY NEWS

Albany County

The first fall meeting of the Albany County Medical Society was held September 22 at the Albany College of Pharmacy Dr Edward S Goodwin, associate professor of pediatrics at Albany Medical College and attending pediatrician at Albany Hospital, gave the vice-presidential address on 'Glycogen Storage Disease"

On September 16 members of the Albany County Medical Society joined with the Albany County Bar Association for a field day at Wolferts Roost. Dr Sheldon Church was chairman of the Medical Society committee, which included Drs John J Marra, Christopher Staler, Jr, James H Flynn, Arthur W Rupert, Edgar N Kemp, and Victor N Tompkins. Dr John J Clemmer is president of the Society

Columbia County

Dr Edward F Hartung, assistant clinical professor of medicine and chief of the division of arthritis, New York Post-Graduate Medical School, New York City, addressed the meeting of the Columbia County Medical Society held October 5 at the St. Charles Hotel, Hudson His topic was "Newer Aspects in the Treatment of Arthritis" The postgraduate instruction was arranged by the State Society Committee on Public Health and Education with the cooperation of the State Department of Health

Fulton County

As a program of postgraduate instruction, Dr Walter F Rogers, Jr, instructor in medicine at the Syracuse University College of Medicine, addressed the meeting of the Fulton County Medical Society held September 23 in Gloversville His subject was "The Management of Diabetes"

Jefferson County

"Lesions of the Esophagus" was the topic of Dr Walter F Bugden, clinical associate professor of surgery, Syracuse University College of Medicine, when he spoke before the October 14 meeting of the Jefferson County Medical Society in Watertown

The postgraduate instruction was arranged by the Council Committee on Public Health and Education of the State Society, in cooperation with the State Health Department

Niagara County

The Tuberculosis and Health Association of Niagara County, in cooperation with the Niagara County Medical Society, has announced the beginning of a series of radio health broadcasts entitled "Why Do You Worry,' arranged through Station WHLD The first broadcast was held September 6, and the program will continue weekly for twelve weeks.

Onondaga County

Dr Leo M Taran, director, St. Francis Sanatorium for Cardiac Children, Roslyn, Long Island, addressed the meeting of the Onondaga County Medical Society October 5 in Syracuse on "The Treatment of Rheumatic Fever" The program was postgraduate instruction arranged by the State Society Committee on Public Health and Education with the cooperation of the State Department of Health.

[Continued on page 2292]



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[Continued from page 2290]

Queens County

William L Laurence, science news editor for the New York *Times*, spoke on "The Promise of Atomic Energy in Human Welfare" at the joint meeting of the Queens County Medical Society and the Queensboro Tuberculosis and Health Association held September 28 in the Medical Society building.

On October 1, Dr Joseph H Siris, attending neurosurgeon at Flushing, Jamaica, and Brooklyn Jewish Hospitals and associate neurosurgeon at Queens General Hospital, spoke on "Ruptured Lumbar Disk and Sciatica" as a program arranged by the Society's Committee on Graduate Education

Richmond County

Postgraduate instruction arranged for the Richmond County Medical Society by the State Society with the cooperation of the State Health Department includes November 10—"Physiologic Studies of *Toxemias of Pregnancy*," Dr Howard C Taylor, Jr, professor of obstetrics and gynecology, Columbia University, College of Physicians and Surgeons, December 8—symposium on "Heart Disease and Pregnancy," Dr Edward P Maynard, Jr, professor of clinical medicine, Long Island College of Medicine, Brooklyn, and Dr J Thornton Wallace, clinical professor of obstetrics and gynecology, Long Island College of Medicine

The sessions are held at the Old Mill, Hyland Boulevard, Staten Island, beginning at 9 30 P M.

St Lawrence County

Dr Walter F Bugden, clinical associate professor of surgery at the Syracuse University College of Medicine, gave a talk on "Tumors of the Chest" at the meeting of the St. Lawrence County Medical Society held October 14 at Potsdam The postgraduate instruction was arranged by the Council Committee on Public Health and Education of the State Society with the cooperation of the State Department of Health

Schenectady County

Two programs of postgraduate instruction have been arranged for the Schenectady County Medical Society by the State Society Council Committee on Public Health and Education with the cooperation of the State Department of Health. On October 5, Dr Henry H Ritter, professor of clinical surgery at the New York Post-Graduate Medical School, spoke on "Fractures in General—The Treatment of Common Fractures" On November 2, Dr George P Heckel, assistant professor of obstetrics and gynecology at the University of Rochester School of Medicine and Dentistry, will speak on "The Practical Applications of Endocrines in Gynecology"

The meetings are held in the auditorium of the Eastern New York Orthopedic Hospital, at 8 30 P M.

Schoharie County

A series of programs of postgraduate instruction have been arranged for the Schoharie County Medical Society, to be held Tuesday afternoons at 4 00 P M at the Cobleskill High School, Cobleskill The programs were arranged by the State Society Council Committee on Public Health and Education with the cooperation of the State Department of Health.

Dates of the talks, with subjects and speakers, are

October 5—"Common Diseases of the Skin—Illustrated with Color Photography," Dr Leon H Griggs, professor of clinical medicine (dermatology and syphilology), Syracuse University College of Medicine

October 19—"Gynecology in General Practice," Dr Chester E Clark, professor of gynecology, Syracuse University College of Medicine

November 2—"Disabilities of the Foot and Ankle," Dr Richard S Farr, professor of orthopedic surgery, Syracuse University College of Medicine

November 16—"Rheumatic Fever," Dr Ethel G Cermak, assistant professor of pediatrics, Albany Medical College

November 30—"The Ophthalmoscope in the Diagnosis of General Disease," Dr Alfred Weintraub, instructor in ophthalmology, New York University College of Medicine

Sullivan County

Dr Paul A. Bunn, associate professor of medicine, Syracuse University College of Medicine, will speak on "Recent Advances in Therapy" at the meeting of the Sullivan County Medical Society, to be held Wednesday, November 17, at 8 30 P M at the Monticello Hospital, Monticello

The program is postgraduate instruction arranged by the Council Committee on Public Health and Education of the State Society with the cooperation of the State Department of Health

Ulster County

At the meeting of the Ulster County Medical Society, held October 5 in Kingston, Dr Frederick W Williams, visiting physician at the Morrisania City Hospital, the Bronx, spoke on "Gangrene, Infection and the Management of the Surgical Diabetic" The program was postgraduate instruction arranged by the State Society's Council Committee on Public Health and Education with the cooperation of the State Department of Health

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DR BRONK NEW PRESIDENT OF JOHNS HOPKINS UNIVERSITY

Dr Detlev W Bronk, director of the Johnson Foundation and professor of biophysics of the University of Pennsylvania, has accepted the presidency of the Johns Hopkins University, according to an announcement by the Board of Trustees

Dr Bronk, who will take up his appointment January 1, 1949 will succeed Dr Isaiah Bowman, who has been president of Johns Hopkins since 1935 He will become the sixth president to head the University since its founding in 1876

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(Excerpts from N.Y State J'l of Medicine—October 1945)

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WOMAN'S AUXILIARY

TO THE MEDICAL SOCIETY OF THE STATE OF NEW YORK

To Hold Fall Executive Board Meeting

THE fall meeting of the Executive Board of the Woman's Auxiliary to the Medical Society of the State of New York will be held Monday and Tuesday, October 18 and 19, at the Hotel Syracuse, Syracuse, with the opening session on Monday afternoon at 1 30 P M A dinner will be held at 7 00 P.M , and on Tuesday there will be two meetings of the board, one at 9 30 A M , and the other following a luncheon at 12 30 P M The meeting will adjourn after the afternoon session

Program for the meeting calls for reports of the state officers, reports and recommendations of the district councilors and chairmen of standing and special committees, reports of the national convention, and a conference of county presidents

District Councilors are District 1—Mrs J Emerson Noll, District 2—Mrs Clifton L Dance, District 3—Mrs Albert VanderVeer, II, District 4—Mrs E M. Stanton, District 5—Mrs John L Mason, District 6—Mrs M M. Monserrate, District 7—Mrs Harry I Norton, and District 8—Mrs Arthur L Bennett

Mrs Edgar M Neptune, Syracuse, State Auxiliary president, will preside at the meeting

COUNTY NEWS

Albany County

The opening Executive Board meeting of the Albany County Woman's Auxiliary was held September 10 with a luncheon given by the president, Mrs Albert M Yunich Plans for the year were discussed, and a tentative outline of the year's program was presented The Auxiliary voted to continue its support of the Physicians' Home and the Red Cross, and to continue its service to the Albany Home for Incurables

The first regular meeting of the group was held September 22 at the home of Mrs Arthur J Sullivan, Albany, in the form of a "Decorators' Clinic," with Miss Dorothy Hinman, consultant decorator, as guest speaker

Cayuga County

The Cayuga County Woman's Auxiliary began its season with a dinner meeting at the Owasco Country Club on September 16, with Mrs Edward Pratt presiding, Program for the meeting was a panel discussion on "What Every Doctor's Wife Should Know," prepared by the State Auxiliary Legislative and Economics Committees

Plans were made to continue working on the project started last year, redecorating and refurnishing the Children's Convalescent Home in Auburn

Officers for the year are Mrs Pratt, president Mrs Charles T Yarington, first vice-president, Mrs Stephen J Karpenski, second vice-president Mrs G Perry Ross, corresponding secretary, Mrs Donald M Green, recording secretary, and Mrs Howard M Rapp, treasurer

Chautauqua County

The Chautauqua County Woman's Auxiliary, in cooperation with the Cancer Control Committee and the New York State Health Department, set up an exhibit at the Chautauqua County Fair at Dunkirk, September 6 to 11 Literature was distributed and questions were answered by members of the Auxiliary on cancer and its control Dr Julius Prince, district health officer, assisted the Auxiliary in this undertaking

The Auxiliary is continuing its Scholarship Loan Fund for the assistance of student nurses, and this fall the group is helping a girl who is beginning her training course, as well as assisting a second year student A gift from the Chautauqua County Medical Society was received to aid in this work

Dutchess County

The Dutchess County Woman's Auxiliary held an executive meeting at the home of the president, Mrs Albert A Rosenberg, Poughkeepsie, on September 8 Plans were made for the meetings of the coming year, and a luncheon meeting was outlined for October

Kings County

On September 14, Mrs Frederick Elliot was hostess for luncheon at her home for a meeting of the revision committee of the Kings County Woman's Auxiliary, when the bylaws of the Auxiliary were revised

The annual bridge party of the group is scheduled for October 19 At the first luncheon meeting, to be held November 9, Mr Thomas E Walsh, field representative of the Public Relations Bureau of the State Medical Society, and adviser to the auxiliaries, will be guest speaker At that meeting plans for the January and February activities will be presented

Oneida County

A luncheon for the wives of delegates to the annual meeting of the Fifth District Branch of the State Medical Society was held September 14 at the Jefferson County Golf Club in Watertown The Woman's Auxiliary of Oneida County was represented During a round table discussion following the luncheon, Mrs Arthur F Gaffney, Clinton, president of the Oneida Auxiliary, explained the

[Continued on page 2296]

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NESTLÉ'S EVAPORATED MILK

[Continued from page 2294]

nurse's scholarship project undertaken by the group Plans, problems, and projects for the coming year were also discussed by the presidents of the eight county auxiliaries attending

Orange County

Meeting on October 1 at Middletown, the Orange County Woman's Auxiliary executive committee discussed plans for the winter meetings The October meeting will be in the form of a membership tea to which wives of all the county doctors will be invited, in an attempt to stimulate interest and increase membership

The Auxiliary offered two scholarship loans for student nurses this year, publicizing them in the local high schools and county newspapers One application was received, and the student is now training at Kingston Hospital, Kingston

Seneca County

The first meeting of the season for the Seneca County Woman's Auxiliary was held September 21 at the home of Mrs Charles Smith, Waterloo Work on the constitution and other things pertinent to a new organization was continued

During the summer, on July 11, the County Medical Society and the Auxiliary joined in a picnic outing at the cottage of Dr and Mrs Bruno Reimer, Romulus

Tompkins County

The Tompkins County Woman's Auxiliary held a family party at the home of Dr Esther Parker in Jacksonville recently, with about 25 couples and 40 children attending Mrs C Stewart Wallace, chairman, was assisted by Mrs Henry W Ferris and Mrs Willard Short

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ANTIMALARIA DRUG EFFECTIVE IN TULAREMIA, UNDULANT FEVER

Atabrine, the drug which, developed in Germany, was the principal reliance for malaria control in the Pacific and Mediterranean theaters during the war, may be effective in controlling undulant fever and tularemia, a Vandalia, Illinois, physician reports

Writing in the *Illinois Medical Journal*, official publication of the Illinois State Medical Society, Dr D H Ecke, of Vandalia, and Dean H Ecke of the Illinois Natural History Survey, Urbana, described eight cases of tularemia and four cases of undulant fever which Dr Ecke successfully treated

Tularemia, which has become increasingly important in recent years, is usually transmitted to man from infected wild rabbits, while undulant fever, or brucellosis, is contracted either by handling diseased cattle, hogs, sheep, or goats, or eating unpasteurized dairy products from herds infected with contagious abortion or Bang's disease, as brucellosis is known in cattle

The tularemia cases included in the report were all treated up to April, 1948 Typical was a 65-year-old woman who, at the time of examination by Dr Ecke, was "suffering with fever and chills"

"She had an ulcer on her right thumb, and the lymph gland under her right arm was considerably enlarged and very tender," the report disclosed "These symptoms strongly suggested a case of ulcero-glandular tularemia

"Further inquiry brought out some important facts "She had dressed some freshly killed wild rabbits (cottontails) about three weeks previously—about a week before her illness started Two or three days after she had dressed the rabbits, a primary papule (sore) developed on the right thumb This papule would not heal and developed into the persistent ulcer noted above"

Dr Ecke prescribed atabrine to be taken three times daily for five days

"At the end of the fifth day, she reported back for examination," the report continued "She said that the chills and fever had left on the second day with no recurrence Examination showed lymph glands normal and the ulcer nearly healed, with no infection evident She has had no recurrence"

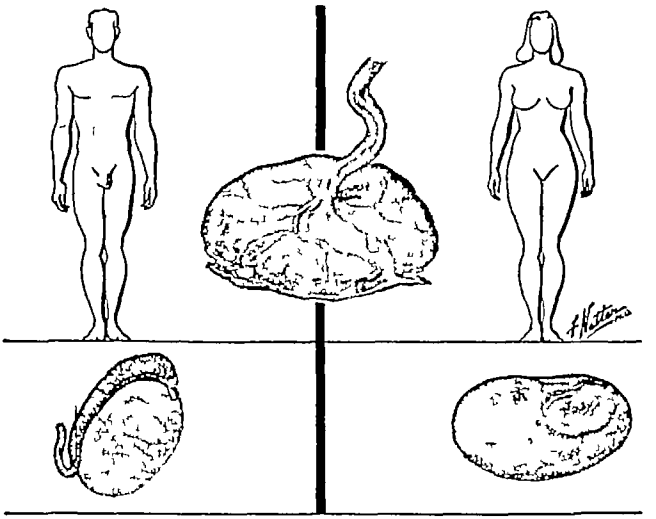
Similarly, the report stated, seven other patients were treated "who showed the typical symptoms of ulcero-glandular tularemia as described above Every case was traced to the handling of rabbits a few days before," the report added. "The characteristic chain of symptoms followed Without exception, atabrine produced a favorable response within one to three days and not one case required further treatment after the fifth day In none of these cases has there been a recurrence of symptoms"

Dr Ecke employed the same treatment in four undulant fever cases, diagnosis of which in three cases was confirmed by laboratory study of blood In these cases, all symptoms of undulant fever disappeared within five days after atabrine was started One patient relapsed after almost five years, but recovered after two or three days of atabrine treatment.

Although the organisms responsible for brucellosis, or undulant fever, have been known for more than sixty years, there has been no positive treatment for the disease The sulfa drugs and penicillin proved disappointing and so did streptomycin, although recently a combination of streptomycin and sulfadiazine has been reported successful Against tularemia, streptomycin has been much more successful However, the drug has its limitations It is expensive and it may produce unfavorable side reactions, such as damage to cranial nerves, causing loss of balance Also its continued use may produce a resistance against itself rendering it ineffective if needed at some later date

Commenting on the series of patients treated with atabrine for undulant fever and tularemia, Dr Ecke pointed out that "none of the patients were able to afford streptomycin nor was the drug available in most cases"

"Experimentation with atabrine has given us very favorable results in all cases of tularemia and undulant fever in which it was used," the report concluded "It is now a question of whether this treatment will give positive results when extensively used"



GONAD STIMULATION

IN THE MALE AND IN THE FEMALE

The action of chorionic gonadotropin clinically parallels that of the luteinizing hormone of the pituitary gland Chorionic Gonadotropin Armour available in lyophilized form is effective in both male and female where luteinizing hormone is indicated. Thus, it is of great value in the treatment of cryptorchidism and has been used successfully in the treatment of simple hypogonadism and hypogenitalism because of its true gonad stimulating effect. In the female it has been employed effectively in the treatment of functional uterine bleeding as well as in secondary amenorrhea, oligomenorrhea and hypo ovarianism where a deficiency of luteinizing hormone exists

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HOSPITAL NEWS

Lay Cornerstone for Cancer Hospital

CORNERSTONE-laying ceremonies for the six-story, 307-bed Francis Delafield Hospital for Cancer, 163rd Street and Fort Washington Avenue, New York City, were held September 1, with Mayor William O'Dwyer officiating The hospital will be affiliated with Columbia-Presbyterian Medical Center Dr Edward M Bernecker, commissioner of hospitals, presided at the ceremony

On recommendation of the faculty of the College of Physicians and Surgeons, Columbia University, the new hospital will memorialize Francis Delafield (1841–1915), distinguished New York pathologist and physician, who worked both at Bellevue Hospital and Columbia University

The hospital will have approximately 2,200,000 cubic feet of floor space, and its initial bed capacity of 307 beds may later be expanded It will include, in addition to facilities for deep therapy, radium therapy, chemotherapy, and ancillary services, three floors to house pathology, biochemistry, and bacteriology laboratories for routine hospital services, isotope storage and processing, and research

Regional Councils Approve Hospital Construction

APPROVAL of hospital construction and expansion project applications, for possible aid under the Federal Hospital Survey and Construction Act, has been voted by four of the regional councils of the New York State Hospital Planning and Survey Commission

Designed to provide hospitals in rural areas and urban sections with hospital needs, Public Law 725, the Hill-Burton Bill, by means of allotments to the states, allows Federal contributions of one third of the cost toward the construction or expansion of community hospitals The Hill-Burton Act allocates $2,900,000 each year for five years to New York State for assistance in expanding hospital facilities, with six million dollars now available to begin construction.

Recommendations forwarded by regional councils to the State Commission include

Albany Regional Hospital Planning Council—(1) A new 50-bed voluntary, nonprofit general hospital at Lake Placid, costing approximately $600,000, of which $200,000 would be Federal funds, (2) a new laboratory at the Fox Memorial Hospital in Oneonta, at a total cost of $60,000, of which $20,000 would be Federal funds, (3) a new 104-bed addition to the Hudson City Hospital, with reconstruction of existing facilities for service and administrative purposes at a total cost of $1,328,250, of which $442,750 would be Federal funds, and (4) a new 121-bed addition to the Albany Hospital, to provide much-needed facilities serving the entire region, providing beds for neurosurgery, thoracic surgery, plastic surgery, and other specialized types of work. The project would cost an estimated $3,292,000, with $1,097,083 to be in Federal funds

Rochester Regional Hospital Planning Council—(1) A new 100-bed hospital for Seneca County, estimated to cost $1,152,600, of which the Federal grant would be $384,200, (2) modernization and addition to the Dansville General Hospital, including new quarters for 36 of the hospital's 45 beds which are now unsuitably housed, and addition of 21 new beds, at an estimated cost of $560,326, toward which a Federal grant of $182,666 was asked, (3) addition to the Cuba Memorial Hospital, to add 31 beds to the present 19, at a cost of $197,000, of which $65,000 would be in Federal aid, and (4) new building and equipment for the Arnold Gregory Hospital, Albion, with construction of a 50-bed capacity building, to cost $480,900, for which Federal funds asked are $159,800

Syracuse Regional Hospital Planning Council—(1) The House of Good Samaritan, Watertown, (2) the Oswego Hospital, Oswego, (3) Oneida City Hospital, Oneida, (4) Lewis County General Hospital, Lowville, (5) Tioga County General Hospital, Waverly—all projects proposing additions to existing facilities, (6) Clifton-Fine Hospital, Star Lake, (7) E J Noble Hospital, Alexandria Bay, (8) E J Noble Hospital, Gouverneur, and (9) Hamilton Community Hospital, Hamilton.

Buffalo Regional Hospital Planning Council—(1) A complete, 50-bed hospital at Gowanda, (2) a 110-bed, 24-bassinet Genesee Memorial Hospital at Batavia, to include also a county laboratory with radiographic, clinical photography, blood bank, physiotherapy, and surgery departments, (3) a 100-bed St Jerome Hospital at Batavia and the remodeling of one wing of the present building into a 75-bed unit for chronic care use, (4) a 165-bed, 28-bassinet Christian Association Hospital at Jamestown, including plans for a fireproof building to replace the present main building, and a four-story addition, and (5) a 175-bed Jamestown General Hospital, with conversion of existing buildings to house municipal laboratories, the city health department, and outpatient clinics

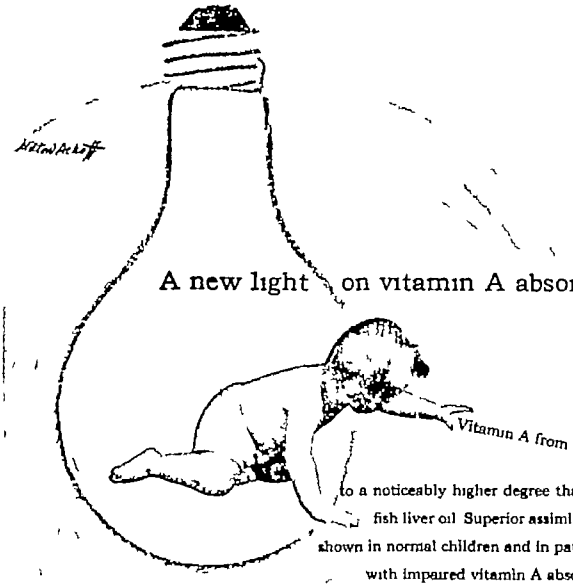
Hospitals to Get Increased Payments

TO COUNTERACT inflated hospital expenses, Associated Hospital Service of New York will make extra payments of at least $2,500,000 in the next year to its 260 participating hospitals, with quarterly revisions in payments based on cost-of-living changes, it was announced recently

No rate increase will be made to Blue Cross members at this time, Louis H Pink, AHS president said However, he added, future rates "must be based on the experience and cost under this plan"

The new basic rates, put in effect September 1, increase average daily payments to hospitals from $12 47 to $13 71, plus additional payment for private rooms, from $13 58 to $14 59 for semiprivates, and from $10 01 to $12 for wards

[Continued on page 2300]



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Supplied in 15 and 30 cc. dropper bottles.

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Vifort® water-dispersible polyvitamin drops

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[Continued from page 2298]

To Train Volunteer Case Aides

THE United Hospital Fund of New York announced recently that it is receiving applications for trainees as Volunteer Case Aides in medical social service, with a preliminary meeting for the candidates held on September 28 at the Hotel Biltmore

The VCA classes, to last thirteen weeks, include two hours of class discussion each week at the Fund's headquarters, 8 East 41st Street, New York City, and five hours of training each week in a designated training hospital. In applying for training for VCA, candidates must pledge to serve in a hospital two hundred hours in the year following graduation

Dr Henry N Pratt, administrator at Memorial Hospital, addressed the preliminary meeting on "The Hospital's Need for Volunteer Case Aides"

Recommends General Hospital Care for Patient with Poliomyelitis

THE Hospital Council of Greater New York, in a recent issue of the *Bulletin*, pointed out that "The general hospital is the ideal place to care for the poliomyelitis patient, for it offers all of the various medical services and hospital facilities that are essential for the complete care of the patient, without hazard of infection to other patients or to hospital personnel.

"While statistics show that the incidence of infantile paralysis has been climbing upward during the past five years, it remains numerically an infrequent disease," the Council continued "Because polio hits suddenly, in widely separated areas—one year here, the following year there—and because in the public mind it is one of the most dreaded diseases," the Council emphasized that "the general hospital which prepares to offer adequate care to the patient with polio is offering an additional service to the community In turn this additional service," the Council pointed out, "will make the community more than ever aware of the value of its general hospital."

The Hospital Council cited the unit for patients with poliomyelitis at Knickerbocker Hospital in New York City as the type of service which might serve as an example to general hospitals wishing to offer this additional community service

It was pointed out that "The general hospital which anticipates offering the community services essential to polio patients probably will want to evaluate its program in advance of the usual polio season, June through September in the New York City area, in case of a polio epidemic next summer or any other summer"

Hospital Leaders to Study Finances

ALARMED by the financial crisis facing the voluntary hospitals of the nation, the American Hospital Association announced September 20 that it would sponsor a two-year study to determine present and future income prospects

The announcement was made at the opening of the fiftieth annual convention of the association, attended by 7,500 hospital trustees, administrators, and department heads from the United States, Canada, and foreign countries

The study group, to be known as the Commission on Hospital Finance, will include 15 persons representing a cross section of the American public

The study is to be complementary to the one made by the Commission on Hospital Care, completed in 1946, which described the nature of services being provided by the hospitals and defined the pattern involving both facilities and type of service

The project will be conducted independently of the authority of the association, which will exercise no controls beyond those incorporated in the statement of purpose and scope

It is expected that funds for financing the study, estimated at $300,000, will be obtained from philanthropic foundations and individuals interested in health projects

Postgraduate Courses in Clinical Medicine

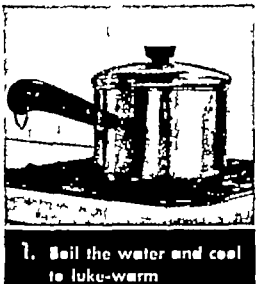
THE Mount Sinai Hospital, in affiliation with Columbia University, announces a Symposium in Internal Medicine to be given October 5 to December 7, 1948, and to be repeated January 24 to March 28, 1949 This Symposium may be taken in its entirety, or one or more of the ten courses may be taken separately in the following subjects cardiovascular, gastrointestinal, endocrinologic, venereal and skin diseases, diseases of the liver, kidney, chest, metabolism, as well as in hematology and allergy

Individual courses, varying in length, will be given from September 20, 1948, to June 28, 1949 Courses for general practitioners will be given in elementary and advanced electrocardiography, intensive gastroenterology, geriatrics, gynecology, bedside clinics in heart disease, clinical neurology, practical and advanced practical neuroanatomy and neuropathology, medical ophthalmology, ophthalmoscopy, pathology, pediatrics, physical medicine, physiology and psychiatry in general medicine

Individual courses for specialists will be given in anesthesia (nerve blocking), electroencephalography, ophthalmology (nine separate courses, including a four-week symposium), otolaryngology, nuclear physics and surgery of the gastrointestinal tract

Request for applications should be addressed to the Registrar for Medical Instruction, The Mount Sinai Hospital, Fifth Avenue and 100th Street, New York 29, New York.

[Continued on page 2302]



1. Boil the water and cool to luke-warm



2. Float measured powder on top of the water



3. Mix with a large spoon or fork

SIMILAC FEEDINGS ARE Easy TO PREPARE

It takes only 30 seconds to induce solution *if the powder is floated on top of the water* Lukewarm, boiled water is desirable.

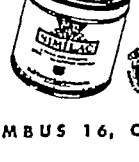
No need to mix several ingredients—hence the possibility of errors in measurement is greatly reduced

The ratios of fat, sugar, and protein, *and the zero curd tension*, remain constant regardless of concentration Therefore, no gastrointestinal disturbance will normally occur, should the mother err occasionally in counting the number of measures of Similac powder

The level tablespoon measure in each can eliminates the possibility of underfeeding or overfeeding due to varying sizes of "tablespoons"

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SIMILAC a dependable food during the all-important first year



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[Continued from page 2300]

NEWS NOTES

An analysis of admissions to the Auburn City Hospital for the year 1947 reveals that 3,643, or 42 per cent of the total admissions, were residents of Cayuga County who resided outside Auburn Admissions to the hospital by residents of Auburn totaled 4,805, or 57 per cent of the total hospital admissions

• • •

The board of managers of Ellis Hospital, Schenectady, has announced a plan to contribute to better and safer prenatal maternity care in Schenectady County Dr James E Fish, hospital director, announced that the plan will involve chest x-ray and a blood test for the Rh factor early in pregnancy for any of the hospital's maternity patients Patients may be sent to the hospital by their own physicians for these tests Dr Fish announced that the hospital is extending this service without charge to maternity patients in the interest of improved obstetric practice in the community and in the hope that it may help to reduce complications and mortality

• • •

The Board of Supervisors of Niagara County has authorized construction of a 200-bed hospital at the Niagara County Infirmary at a cost of more than $650,000 Work was expected to start on October 1, with contracts calling for its completion within sixteen months

• • •

A clinic for the deaf has been established by the Beth David Hospital, New York City, it was announced September 26 Surgical treatment of patients with hearing defects will be undertaken, with evening clinics to be conducted on Wednesdays

• •

Cornerstone-laying ceremonies for the new $2,500,000, six-story building of the Jewish Sanatorium and Hospital for Chronic Diseases of Brooklyn were held September 19 on a site adjoining the hospital's present facilities Mayor William O'Dwyer, who was present in 1946 for groundbreaking ceremonies for the new hospital, attended the cornerstone ceremony

• •

Seventeen physically handicapped children between the ages of five and eleven are "going to school" in Port Jefferson, Long Island, in a special hospital class designed to rehabilitate them vocationally and socially The experiment is sponsored by the Port Jefferson Board of Education at the St Charles Hospital for Crippled Children

At the annual meeting of the Genesee Memorial Hospital Medical Staff, held in Batavia, the following officers were elected Dr John L Cathie, president, Dr Paul J Maloney, vice-president, Dr Joseph S Diasio, secretary-treasurer, Dr Irwin A Cole, chief of surgery, and Dr Sydney L McLouth, representative of the general practitioners

•

Dr William Spielberg, previously senior associate otolaryngologist at the Gouverneur Hospital, has been promoted to visiting otolaryngologist

•

Dr Joshua H Leiner has been appointed director of the department of neuropsychiatry at Fordham Hospital, New York City

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FINGERNAIL POLISH "BASE" DAMAGES WOMEN'S NAILS

A new medical mystery affecting women particularly was reported by Drs James H Mitchell, Douglas A MacFayden, and Bernard Jaffe, of the University of Illinois College of Medicine and Presbyterian Hospital in Chicago, to the A M A

Use of a "base coat" to make nail polish stay on longer has been causing strange damage to women's nails The fingernails turn purplish blue, then white, and begin to separate from the fingers As one physician facetiously put it, "The polish may stay on but the nails come off"

Whether the nails will recover and what causes the condition are unsolved mysteries The Chicago doctors saw their first case in February this year They have had reports of several hundred cases from doctors all over the country The most widely sold brand of base coat has, naturally, caused the greatest number of cases All brands probably are involved, since the trouble probably comes from a chemical ingredient used in all of them. So far, the ingredient has not been identified —*Science News Letter, July 3, 1948*

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BOOKS

Books for review should be sent to the Book Review Department at 1313 Bedford Avenue, Brooklyn, N Y Acknowledgment of receipt will be made in these columns and deemed sufficient notification. Selection for review will be based on merit and interest to our readers.

RECEIVED

Text-book of Public Health (Formerly Hope and Stallybrass) By W M Frazer, M D, and C O Stallybrass, M.D (State Medicine) Twelfth edition Octavo of 571 pages, illustrated Baltimore, Williams & Wilkins Co, 1948 Cloth, $6 50

Diseases of the Nose, Throat and Ear A Handbook for Students and Practitioners By I Simson Hall, M B (Edin) Fourth edition Duodecimo of 463 pages, illustrated Baltimore, Williams & Wilkins Co, 1948 Cloth, $4 50

Neuroanatomy By Fred A Mettler, M D Second edition Quarto of 536 pages, illustrated St Louis, C V Mosby Co, 1948

The Medical Clinics of North America. New York Number May, 1948 Octavo Philadelphia, W B Saunders Co, 1948 Published Bi-Monthly (six numbers a year) Cloth, $16 net, Paper, $12 net

Vascular Diseases in Clinical Practice By Irving Sherwood Wright, M D Large duodecimo of 514 pages, illustrated Chicago, Year Book Publishers, 1948 Cloth, $7 50

Treatment of Heart Disease By William A Brams, M D Octavo of 195 pages, illustrated Philadelphia, W B Saunders Co, 1948 Cloth, $3 50

Modern Clinical Psychiatry By Arthur P Noyes, M D Third edition Octavo of 525 pages Philadelphia, W B Saunders Co, 1948 Cloth, $6,00

A History of the Heart and the Circulation By Fredrick Willius, M D, and Thomas J Dry, M S, in Med. Octavo of 456 pages, illustrated Philadelphia, W B Saunders Co, 1948 Cloth, $8 00

Chronic Ill-health Relieved by Drainage of the Para-Nasal Sinuses By Rosa Ford, M B (Lond) Duodecimo of 104 pages, illustrated London, Henry Kimpton, 1948 Cloth, 6/6

Children's Eye Nursing By James Hamilton Doggart, M D Duodecimo of 144 pages, illustrated London, Henry Kimpton, 1948 Cloth, 9/6

Medical Symphony A Study of the Contributions of the Negro to Medical Progress in New York By Gerald A Spencer, M D Octavo of 120 pages, illustrated New York, The Author, 1947 Cloth, $3 50

History of the Medical Society of the District of Columbia. Part II 1833–1944 History Committee, John Benjamin Nichols, M D, Chairman Octavo of 357 pages, illustrated Washington D C, Medical Society of the District of Columbia, 1947

Manual for Laboratory Work in Mammalian Physiology By Fred E D'Amour and Frank R. Blood Long quarto, 50 experiments, illustrated Chicago, University of Chicago Press, 1948 Paper, $2 75

Ophthalmology in the War Years. Vol II (1944–June, 1946) Edited by Meyer Wiener, M D Octavo of 977 pages Chicago, Year Book Publishers, 1948 Cloth, $16

Clinical Laboratory Methods and Diagnosis A Textbook on Laboratory Procedures with Their Interpretation. By R B H Gradwohl, M D, and Dr Pedro Kouri Fourth edition In three volumes Quarto Vols I and II, 2,284 pages Vol III, Parasitology and Tropical Medicine, 864 pages Illustrated St Louis, C V Mosby Co, 1948 Cloth, $40 set

The Diabetic's Handbook How to Work with Your Doctor Treatment by Diet and Insulin By Anthony M Sindoni, Jr, M D Octavo of 194 pages, illustrated New York, Ronald Press, 1948 Cloth, $3 00

Medical Hypnosis By Lewis R Wolberg, M D In two volumes Vol I, The Principles of Hypnotherapy, 449 pages Vol II, The Practice of Hypnotherapy, 513 pages Octavo New York, Grune & Stratton, 1948 Cloth, Vol I, $5 50, Vol II, $6 50

Diagnosis in Gynaecology A Classification of Gynaecological Diseases Based on Aetiology and the Clinical Logic for Diagnosis By James V Ricci, M D Octavo of 259 pages Philadelphia, Blakiston Co, 1948

Vitamine und Vitamintherapie By Emil Abderhalden, M D, and Georges Mouriquand, M D Octavo of 408 pages, illustrated Bern, Switzerland, Medizinischer Verlag Hans Huber, 1948 Board, 28 Fr

The Skull, Sinuses & Mastoids A Handbook of Roentgen Diagnosis By Barton R. Young, M D Octavo of 328 pages, illustrated Chicago, Year Book Publishers, 1948 Cloth, $6 50

Oral Vaccines. And Immunization by Other Unusual Routes By David Thomson, M B (Eng), Robert Thomson, M.B (Eng), assisted by James Todd Morrison, M D Quarto of 329 pages, illustrated Baltimore, Williams & Wilkins Co (published for the Pickett-Thomson Research Laboratory, London), 1948 Cloth, $11 00

The Nursing of Tuberculosis By O V Buxton, S R N, and P M Maculloch Mackay, S R.M N Illustrated by Nora Lewis, S R N Duodecimo of 124 pages, illustrated Bristol, John Wright & Sons, Ltd (Baltimore, Williams & Wilkins Co), 1947 Cloth, $2 00

The Salicylates A Critical Bibliographic Review By Martin Gross, M D, and Leon A Greenberg, Ph.D Octavo of 380 pages, illustrated New Haven, Hillhouse Press, 1948 Cloth, $6 00 (Monographs of the Institute for the Study of Analgesic and Sedative Drugs)

The Healthy Hunzas By J I Rodale Octavo of 263 pages, illustrated Emmaus, Pa, Rodale Press, 1948 Cloth, $2 75

Essays on Historical Medicine By Bernard J

[Continued on page 2306]

Findings from the Saratoga Spa records*



INHALATIONS

The results obtained in the treatment of 738 patients with inhalation at the New York State-owned Saratoga Spa show interesting tendencies

Marked relief of the condition treated was noted in 38 patients (5.2%), moderate relief in 468 patients (63.4%) temporary relief in 46 (6.4%) and no change in 185 (25%)

Conditions for which the treatments were given included sinusitis coryza, bronchitis chronic rhinitis, bronchial asthma, laryngitis, allergic rhinitis, hay fever and pharyngitis The treatments consisted of the inhalation of finely nebulized saline alkaline naturally carbonated mineral waters and medicated oils

The relief obtained bore a definite relation to the number of treatments taken In acute conditions from four to six treatments were necessary to obtain consistent improvement while in chronic conditions twelve to fifteen treatments were usually required

Inhalations are taken without discomfort which is an important factor in therapy

The safety of the therapy can be stressed Reactions of significance occurred in only three patients One patient may possibly have had a sensitivity to chlorenan one developed an acute asthmatic paroxysm and the third noted a general reaction to epinephrine

Attention to the general condition of the patients suffering from respiratory disorders is an important factor Inhalations have a definite place in the general "cure" regimen of a spa

** printed in the New York State Journal of Medicine, 44.1214 (June 1) 1944.*

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Many physicians have come to the Spa for the same kind of treatments that have helped their patients here After a restorative "cure" at the Spa, you, too, will return to your practice refreshed—revitalized—ready for the busy days that lie ahead.

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Listed by the Committee on American Health Resorts of the American Medical Association

THE EMPIRE STATE'S CONTRIBUTION TO THE MEDICAL PROFESSION

[Continued from page 2304]

Ficarra, M D Octavo of 220 pages, illustrated New York, Froben Press, 1948 Cloth, $5 00

Bright's Disease By Henry A. Christian, M D Octavo Illustrated New York, Oxford University Press, 1948 Cloth, $9 00 [Reprinted from Oxford Loose-Leaf Medicine]

Arterial Hypertension. By David Ayman, M D Edited by Henry A. Christian, M.D Octavo Illustrated New York, Oxford University Press, 1948 Cloth, $2 50 [Reprinted from Oxford Loose-Leaf Medicine]

Subacute Bacterial Endocarditis By Emanuel Libman, M D, and Charles K. Friedberg, M D Edited by Henry A. Christian, M.D Octavo Illustrated New York, Oxford University Press, 1948 Cloth, $3 50 [Reprinted from Oxford Loose-Leaf Medicine]

The Medical Clinics of North America. Mayo Clinic Number July, 1948 Octavo Philadelphia, W B Saunders Co, 1948 Published Bi-Monthly (six numbers a year) Cloth, $16 net, Paper, $12 net

Hemolysis and Related Phenomena. By Eric Ponder, M D Octavo of 398 pages, illustrated New York, Grune & Stratton, 1948 Cloth, $10

Progress in Neurology and Psychiatry An Annual Review Vol III Edited by E A Spiegel, M D Octavo of 661 pages New York, Grune & Stratton, 1948 Cloth, $10

Treatise on Surgical Infections. By Frank Lamont Meleney, M D Octavo of 713 pages, illustrated New York, Oxford University Press, 1948 Cloth, $12

Clinical Ophthalmology For General Practitioners and Students By H. M Traquair, M D Octavo of 264 pages, illustrated St Louis, C V Mosby Co, 1948 Cloth, $9 00

Strabismus A Clinical Handbook By George J Epstein, M D Octavo of 214 pages, illustrated, Philadelphia, Blakiston Co, 1948 Cloth, $5 00

Handbook of Ophthalmology By Everett L Goar, M D Octavo of 166 pages, illustrated St Louis, C V Mosby Co, 1948 Cloth, $5 50

Diseases Affecting the Vulva By Elizabeth Hunt, M D Third edition Octavo of 211 pages, illustrated St Louis, C V Mosby Co, 1948 Cloth, $7 50

Failures in Psychiatric Treatment. Edited by Paul H Hoch, M D The Proceedings of the Thirty-Seventh Annual Meeting of the American Psychopathological Association, held in New York City, June, 1947 Octavo of 241 pages, illustrated New York, Grune & Stratton, 1948 Cloth, $4 50

Midwifery By Ten Teachers under the direction of Clifford White, M D Edited by Clifford White, M D, Frank Cook, M B (Eng), and William Gilliatt, M D Eighth edition Octavo of 560 pages, illustrated Baltimore, Williams & Wilkins Co, 1948 Cloth, $6 00

REVIEWED

The Doctor Discusses Morals By Winfield Scott Pugh, M D Octavo of 75 pages New York, William-Frederick Pr, 1946 Paper, $1 00, Cloth, $2 00

In this modest brochure, the author claims to discuss the question of morals from the viewpoint of the physician, psychologist, and anthropologist rather than from the religio-hysteric viewpoint of the moral reformer It would seem that morals and sex are interchangeable The doctor is not too strongly opinionated and tries to give his interpretation of morality

JOSEPH RAPHAEL

Rypins' Medical Licensure Examinations Topical Summaries, Questions, and Answers Containing for the First Time a Chapter on Psychiatry, Also Numerous Text Changes Throughout Incorporating Current Advances Edited by Walter L Bierring, M D Sixth edition With the collaboration of a review panel. Octavo of 690 pages Philadelphia, J B Lippincott Co, 1947 Cloth, $6 00

This volume is a brief, superficial review of certain important specialties, preclinical and clinical Its purpose is to prepare students for state board examinations There is a good deal of information scattered on every page It should continue to be popular with students

ANDREW BABEY

Probleme Des Selbstmordes By Fritz Schwarz, M D Octavo of 128 pages, illustrated. Bern, Switzerland, Medizinischer Verlag Hans Huber, New York, Grune & Stratton, 1946 Paper, 9 80 Sw Fr

This book contains a thorough statistical study of the incidence, causes, and technics of suicides, based mostly on Swiss data Suicide is presented as a murder case, where the murderer is the victim at the same time He might be mentally ill or mentally normal As far as prevention of suicides is concerned, the suggestion is made to create camouflaged institutions for the rescue of those who are weary of life The book is an excellent guide for medical laymen such as lawyers, sociologists, and ministers

MAX G BERLINER

Preoperative and Postoperative Care By William J Tourish, M D, and Frederick B Wagner, Jr, M D Octavo of 338 pages, illustrated Philadelphia, F A. Davis Co, 1947 Cloth, $6 00

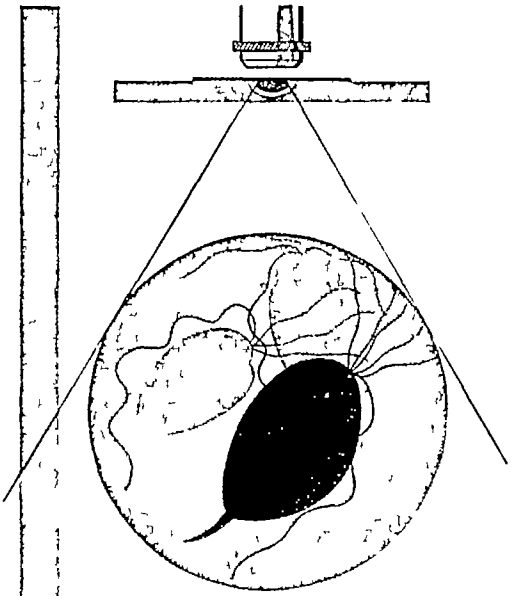
The authors have compiled a readable book on a subject of much importance to both the patient and the operator The welfare of the patient and the success of the operation depend to a considerable degree on such care The contents of the book are grouped in seven chapters, of which four are devoted to pre- and postoperative surgical care. The remaining chapters are concerned with special conditions such as gynecology, neurology For reference, the book should be useful to all concerned with the care of surgical condition

STANLEY B THOMAS

History of the Medical Society of the County of Westchester 1797–1947 By the Medical Society of the County of Westchester, Laurance D Redway, Historian A Compilation from the Available Minutes of the Society and Various Contemporary Sources Octavo of 193 pages White Plains, New York, The Society, 1947 $2 50

[Continued on page 2308]

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[Continued from page 2306]

County medical societies throughout the United States will greatly profit from the example and history as presented in this book of one of America's outstanding and progressive group of medical men The factual data and biographies set forth most interesting reading There are few societies that have the experience of 150 years behind them, as has Westchester Dr Laurance D Redway, historian, an outstanding physician in his community, deserves great credit for the clearness and detail in this work Those members of the profession who are interested in the history of medicine would profit from the study of this book.

THOMAS B WOOD

Sexual Behavior in the Human Male By Alfred C Kinsey, Sc D, Wardell B Pomeroy, and Clyde E Martin Octavo of 804 pages, illustrated Philadelphia, W B Saunders Co, 1948 Cloth, $6 50

The Kinsey report is one of the most important books, medical or otherwise, published in America in the past decade, it will certainly influence social attitudes more than any other

Anyone knows it is a study of the sexual habits of American men, prepared by three scientists at the University of Indiana after years of research The prurient will find little of interest in its pages, which are taken up with numerous tables, meticulously prepared, with careful and impartial summaries noncontroversially presented It would not have seemed likely in advance that the questionnaire method used by the authors would be successful, but the report is thoroughly convincing on this score In retrospect, it seems almost the only method which could be used with the subject and the material, but it needed people like Kinsey and his associates to assure scientific accuracy

The inevitable defect in any study of this sort is the error in sampling, an error which will be minimized as the project proceeds Changes in the statistics will doubtless occur, but the essential validity can scarcely be challenged Everyone concerned should start thinking along altered directions at once This will include everyone who must start with the facts of human behavior as major premises doctors, psychiatrists, teachers, sociologists, judges, penologists, and—the most important group—parents in general Doctors will find in the book some things of immediate clinical application, such as the sensible comments on ejaculatio precox on page 580, which may be read by any patient

I cannot believe but that this study will not at some point shock everyone who reads it The point and degree of internal disturbance will vary with the reader Disturbing as it may be, a study of this kind provides grounds for optimism and hope The first step in any self-improvement starts with a good look in the mirror, which we, as a nation, should not be afraid to take If we are a nation bedevilled by phobias, repressions, and guilt feelings, this book provides the first step in the outcasting of these devils Kinsey brings light into darkness and, as usual, light in turn brings understanding, compassion, and remedial measures

Many questions are raised of course, all of which will urgently require answers The differences between our sex patterns and those of other countries must be studied and their causes discovered Geoffrey Gorer points out, and I see no reason to doubt him, that "petting to climax" is peculiarly American A knowledge of this fact and that kissing between the sexes is now the equivalent of a handshake will profoundly shake many people But all of us, especially parents, should face these, if they are true One may regard them as mass titillation, probably sinister in effect, or as a substitute for worse possibilities, but one must reckon on the phenomena as realities in our civilization To this reviewer, it seems to be that this devaluation of a phase of human relations, however inevitable or necessary, comes close to representing the debasement of an ultimate coin

M PLOTZ

Physical Medicine in General Practice By William Bierman, M D Second edition With a chapter on Medical Rehabilitation by Dr Sidney Licht Octavo of 686 pages, illustrated New York, Paul B Hoeber, 1947 Cloth, $8 00

In this edition the author has included newer developments in the use of penicillin and fever therapy in the treatment of syphilis and also new therapy of early ambulation A new chapter in rehabilitation by Dr Sidney Licht has been incorporated

Primarily intended for the general practitioner, it is also of benefit to the specialized services where the modalities of physical medicine may be used, as he divides many of his chapters into treatment by systems such as cardiovascular, genitourinary, etc

JOHN J HAUFF

The Rotunda Hospital, 1745–1945 By O'Donel T D Browne, M B (Ireland) Octavo of 296 pages, illustrated Baltimore, Williams & Wilkins Co, 1947 Cloth, $11

On March 15, 1745, Bartholomew Mosse opened the Dublin Lying-in Hospital for poor women in George's Lane In July, 1947 (due to war conditions in 1945) the two hundredth anniversary of that momentous event was celebrated with the present Rotunda Hospital in Dublin the center of attraction This volume is the first detailed account of the purely professional work accomplished during all these years and the relation of this work to the history and advancement of obstetrics throughout the world

Dr O'Donel Browne of Dublin has done a magnificent job—accurate, meticulous, fair, entertaining Anyone interested in the history of maternity hospitals or obstetrics will find this volume most interesting and highly educational Of its type, it is easily a book-of-the-month selection and therefore a valuable addition to any library

HENRY B MATTHEWS

Diseases of the Chest. With Emphasis on X-ray Diagnosis. By Eli H Rubin, M D With a Section on "The Principles of Surgical Treatment" By Morris Rubin, M D Quarto of 685 pages, illustrated Philadelphia, W B Saunders Co, 1947 Cloth, $12

The authors and the medical public alike are to be congratulated on the publication of this volume After a splendid summary of x-ray procedures, the acute and chronic pneumonias are discussed, with a special chapter on viral lung infections

Then, in turn, are presented chapters on lung abscess, tuberculosis (158 pages), pneumoconiosis, bronchial obstruction, bronchiectasis, emphysema, cysts, asthma, neoplasms, mediastinal disease, pleural effusion, pneumothorax and heart-lung disease References are numerous and up to date There are many excellent photos and x-ray studies, along with twenty-four plates in color by Frank Netter

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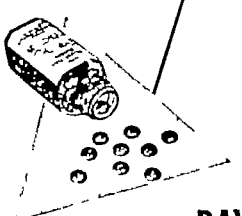
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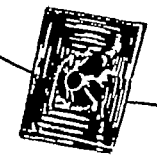
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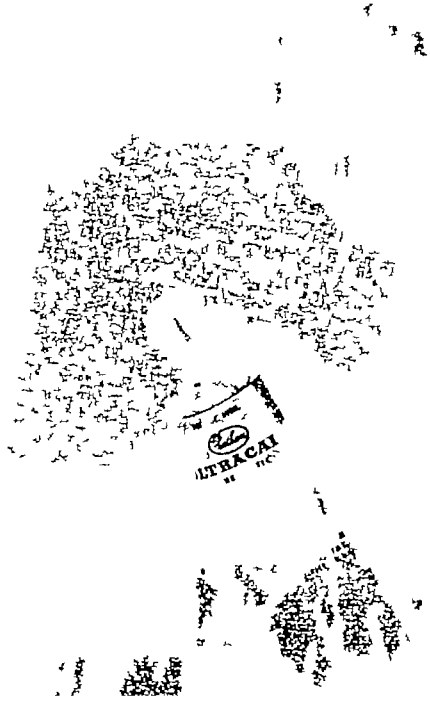
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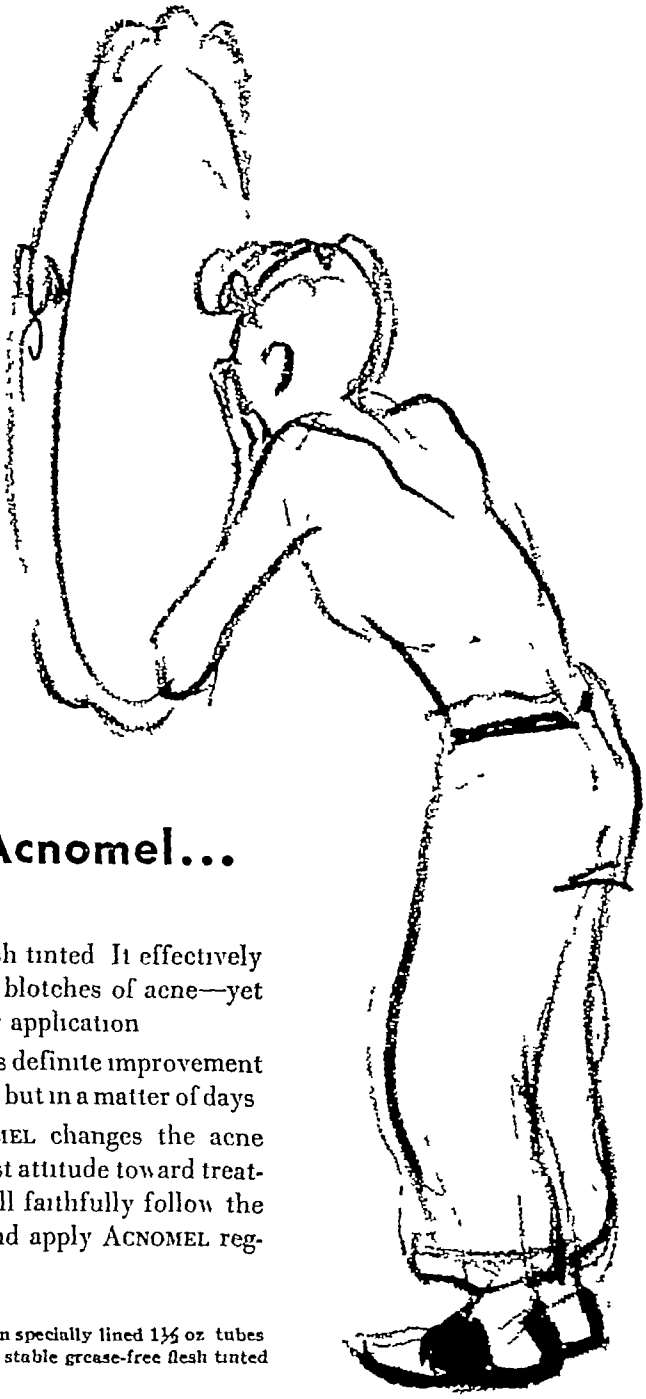
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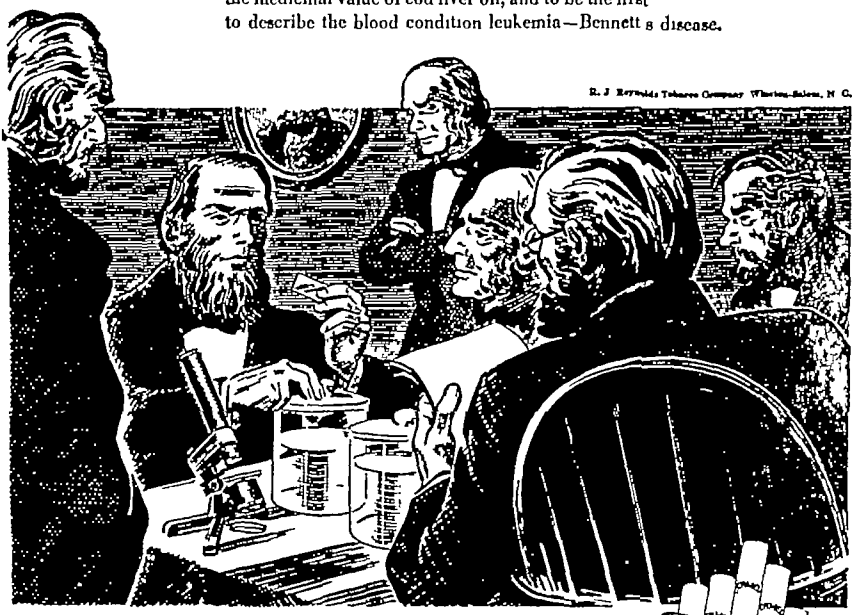
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CONTENTS

SCIENTIFIC ARTICLES

The Outlook for Patients Admitted to a Mental Hospital after the Age of Sixty, *Hollis E Clow, M D* 2357

Schizencephalies with Hydrocephalus Clinical Diagnosis of Severe Cerebral Agenesis, *William F Beswick, M D* 2364

Spinal Epidural Infection, *Everett W Corradini, M D , M Frank Turney, M D ,* and *E Jefferson Browder, M D* 2367

Practical Aspects of Cerebral Vascular Accidents, *H Houston Merritt, M D* 2371

The Function of a Child Guidance Clinic in a Children's Hospital, *Sherman Little, M D* 2379

Scalenus Anticus Syndrome, *Bernard D Judovich, M D* 2382

Electronarcosis in Psychiatric Therapy, *Bernard L Pacella, M D* 2387

An Evaluation of Hydryllin (Diphenhydramine and Aminophyllin) in the Symptomatic Treatment of Allergy, *Harry Markow, M D , Samuel Bloom, M D ,* and *Harry Lesbowitz, M D* 2390

(*Continued on page 2324*)



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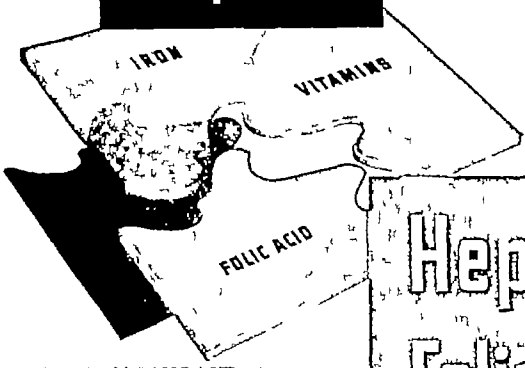
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(*CONTENTS—Continued from page 2322*)

The Management of Anuria in Acute Mercurial Intoxication, *Alfred P Fishman, M D, Irving G Kroop, M D, H Evans Lester, M D*, and *Abraham Hyman, M D* 2393
Acute Urinary Infections in Infants and Children, *Meredith F Campbell, M D* 2397

CASE REPORTS

Fatal Hemorrhage in Boeck's Sarcoid, *Arthur A Fischl, M D, F A C P*, and *Karl Freireich, M D* 2401
Direct Abdominal Hernia, *Joseph B Stenbuck, M D* 2403
Intestinal Obstruction with Ileal Perforation Secondary to Ingested Foreign Body, *Bernard J Ficarra, M D* 2406
Early Carcinoma of the Cervix Detected by the Vaginal Smear, *Locke L Mackenzie, M D* 2407

SPECIAL ARTICLE

Resist Beginnings, *John J Masterson, M D* 2408

EDITORIALS

Vulnerability of Hospitals 2351
Current Editorial Comment 2352
President's Page 2354
Facts About Nutrition 2355

GENERAL FEATURES

Necrology 2412
Medical News 2414

MISCELLANEOUS

State Society Officers 2326, 2328, 2330
County Society Officers 2420
Announcements 2404, 2418



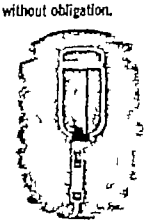


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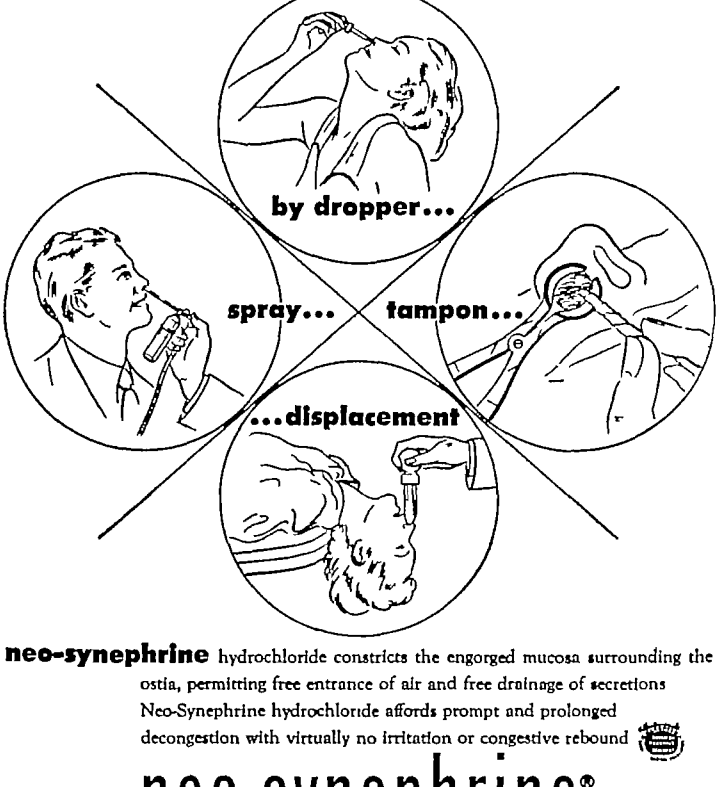
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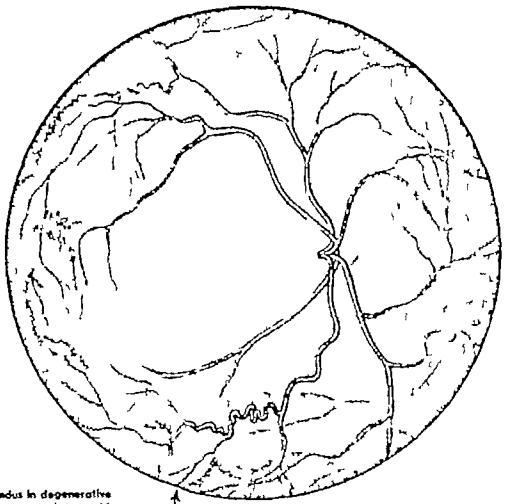
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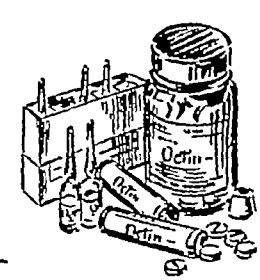
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INDEX TO ADVERTISERS

Abbott Laboratories	2336
The Alkalol Company	2428
American Hospital Supply Corporation	2325
American Meat Institute	2411
The Arlington Chemical Company	2328
A C Barnes Company	2346
Dr Barnes Sanitarium	2428
Milton H Berry Foundation Schools	2425
Bilhuber-Knoll Corp	2330
Brigham Hall Hospital	2428
Bristol Laboratories Inc	2409
Brown's Medical Bureau	2428
Brunswick Home	2428
Burroughs Wellcome & Co	2427
Chatham Pharmaceuticals, Inc.	2319
Ciba Pharmaceutical Products Inc	2nd cover 2337
Commercial Solvents Corporation	2332-2333, 2419
Conti Products Corp	2339
Davies, Rose & Company, Limited	2430
The De Leoton Company	2334
Doak Co , Inc	2334
Falkirk in the Ramapos	2426
Otis E Glidden & Co , Inc	2322
Grant Chemical Company Inc	2341
Greenmont on Hudson	2428
Haleyon Rest	2426
Hoffmann-La Roche Inc	2415
Holbrook Manor	2426
Homemakers Products Corporation	2343
Interpines	2426
Lanteen Medical Laboratories Inc.	2338
The Liebel-Flarsheim Co	2324
Eli Lilly and Company	Between 2350-2351
Louden-Knickerbocker Hall Inc	2426
Mandl School	2425
The Maples Inc	2426
Mead Johnson & Co	4th cover
Philip Morris & Co , Ltd Inc	2344
National Discount & Audit Co	2428
Pinewood	2428
Platishield, Inc	2421
Raymer Pharmacal Company	2349
R. J Reynolds Tobacco Company	2321
J B Roerig and Company	2323
Schenley Laboratories Inc	2345
Schering Corporation	2331
G D Searle & Co	2329
Sharp & Dohme	2350
Smith, Kline & French Laboratories	2320 2335, 2340, 2348 2413 2422
Standard Pharmaceutical Co., Inc	2326
Marvin R. Thompson Inc	2347
Charles B Towns Hospital	2426
Justin Traub	2425
Vaponefrin Company	2342
Harry F Wanvig	2425
William R. Warner & Co Inc	2417
West Hill	2428
Westinghouse Electric Corporation	3rd cover
Whitbread & Co Ltd	2423
White Laboratories Inc	Between 2334-2335
Winthrop-Stearns Inc.	2327
Wyeth Incorporated	2429
Zemmer Company	2424

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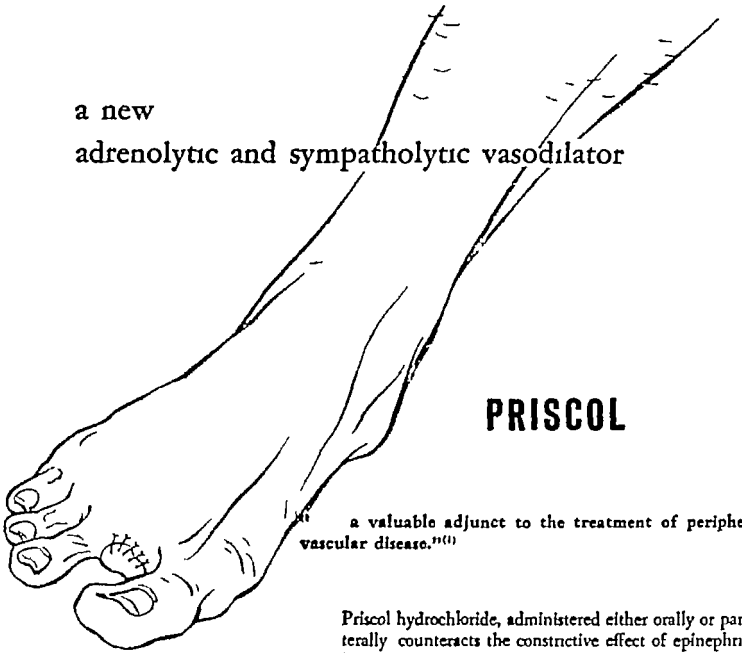
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1 Grimson, K. S., Marzoni, F. A., Reardon, M. J. and Hendrix, J. P.: Surg., 23:728 1948

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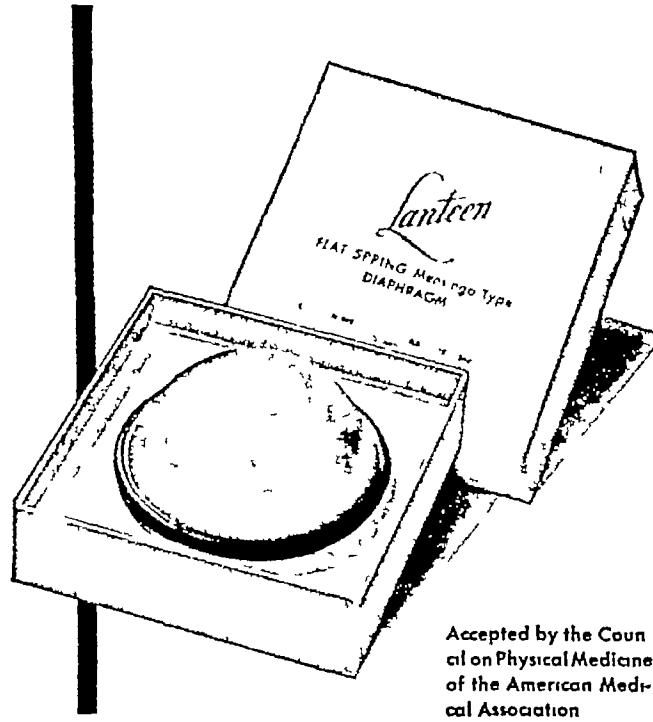
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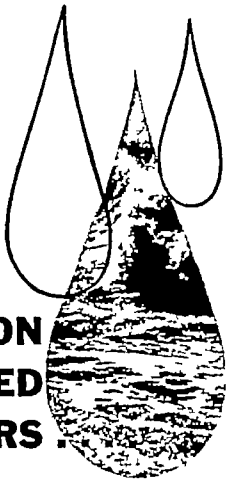
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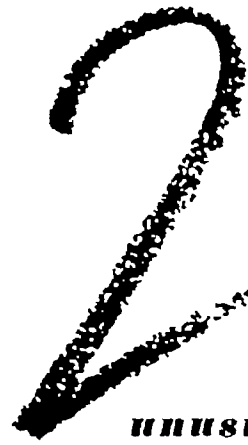
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References 1 Smith O W; Smith G van S and Hurwitz, D Increased excretion of pregnanediol in pregnancy from diethylstilbestrol with special reference to the prevention of late pregnancy accidents, Am J Obst. & Gynec 31:411 1936

2. Meaker S. R A working classification of the causes of abortion J.A.M.A 113:660 1939

3. Bender S.: The value of the Guttmann test in threatened abortion, J Obst & Gynec Brit Emp. 41:783, 1937

4 Vaux, W. G and Rakoff A E.: The treatment of habitual abortion with estrogen and progesterone S rg Clin North America 25 1321 1945.

5. Karnaky K. J Original investigation in gynecological & obstetrical research—sterility endocrine and agnatal operations, M Rec & Ann 35:851 1941

6. Rosenblum G and Melinkoff E. Preservation of the threatened pregnancy with particular reference to the use of diethylstilbestrol, West. J Surg. Obst & Gynec 55:597 191

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Baxter Plasma-Vac (American Hospital Supply Corporation) 2325
Benzebar (Smith, Kline & French Labs) 2348
Cremodiazine & Cremomerazine (Sharp & Dohme) 2350
Crystalline Penicillin G Troches (Bristol Laboratories Inc) 2409
des (Grant Chemical Company, Inc) 2341
Dexedrine Sulfate (Smith, Kline & French Labs) 2413
Diaparene (Homemakers' Products Corp) 2343
Digitalis Pills (Davies, Rose & Company, Limited) 2430
Edrisal (Smith, Kline & French Labs) 2422
Eskadiamer & Eskadiazine (Smith, Kline & French Labs) 2340
Globin Insulin (Burroughs Wellcome & Co) 2427
Heparin/Pitkin Menstruum (William R. Warner & Co, Inc) 2417
Heptuna with Folic Acid (J B Roerig and Company 2323
Liquid Peptonoids (The Arlington Chemical Company) 2328
Neo-Synephrine (Winthrop-Stearns Inc) 2327
Nucarpon (Standard Pharmaceutical Co, Inc) 2326
Octin (Bilhuber-Knoll Corp) 2330
Ohodin (The De Leoton Company) 2334
Par-Pen (Smith, Kline & French Labs) 2335
Pelvicins (Schenley Laboratories, Inc) 2345
Penicillin (Eli Lilly and Company) Between 2350–2351
Petrogalar (Wyeth Incorporated) 2429
Priscol (Ciba Pharmaceutical Products, Inc) 2337
Proluton (Schering Corporation) 2331
Prostigmine (Hoffmann-La Roche Inc) 2415
Raysal with Succinate (Raymer Pharmacal Company) 2349
Ruphyllin (G D Searle & Co) 2329
Salimidol (Doak Co, Inc) 2334
Sulfadiazine with Sodium Lactate (Marvin R. Thompson, Inc) 2347
Syrup Choline Bicarbonate (Commercial Solvents Corporation) 2419
Trasentine-Phenobarbital (Ciba Pharmaceutical Products, Inc) 2nd cover
Ultracain (Chatham Pharmaceuticals, Inc) 2319
Vi-Daylin (Abbott Laboratories) 2336
Zymenol (Otis E Glidden & Co, Inc) 2322

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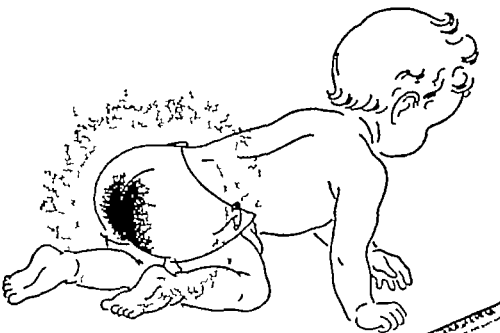
Diathermy (The Liebel-Flarsheim Co) 2324
Monoflex (Westinghouse Electric Corporation) 3rd cover

Miscellaneous

Aerosol Mask (Vaponefrin Company) 2342
Cigarettes (Philip Morris & Co, Ltd., Inc) 2344
Cigarettes (R J Reynolds Tobacco Company) 2321
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1 Cook, J.V. Brennemans Practice of Ped. 4; Chap. 41, 1945.
2. Benson, R.A. et al. J. Ped. 31:349-354, 1947
3. Perlman, R.M.: Skin & Cancer Clinic, Fred Goodwin Hospital, New York, 1948.

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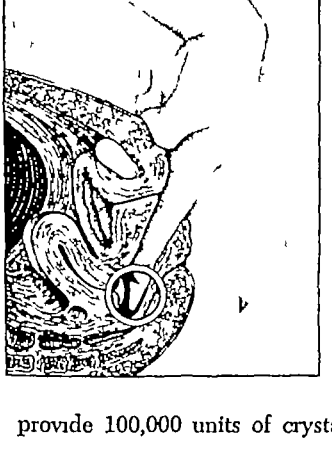
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1. Walter R I Goldberger M A and Lapid L S New York State J Med. 48 1159 (May 15) 1948

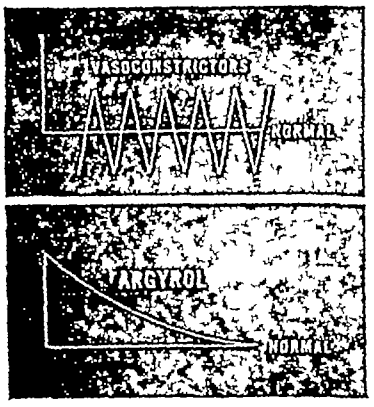
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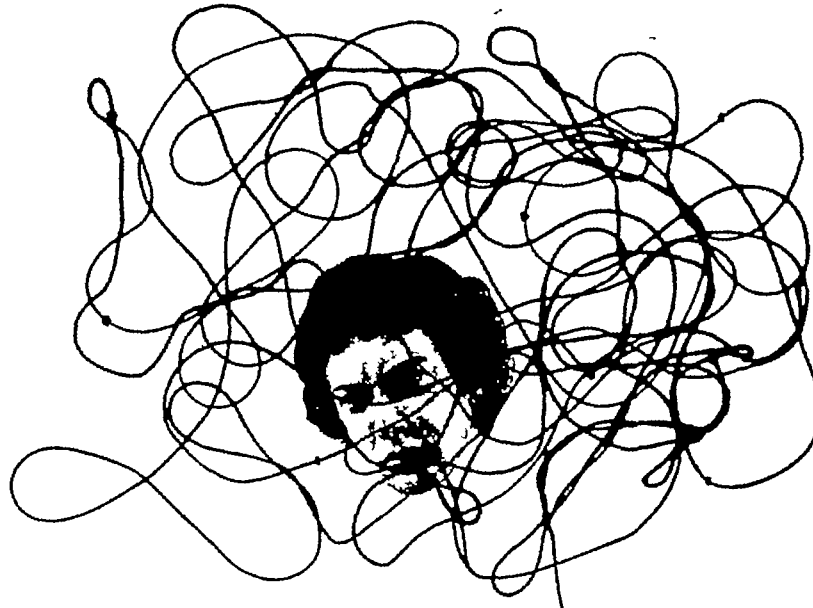
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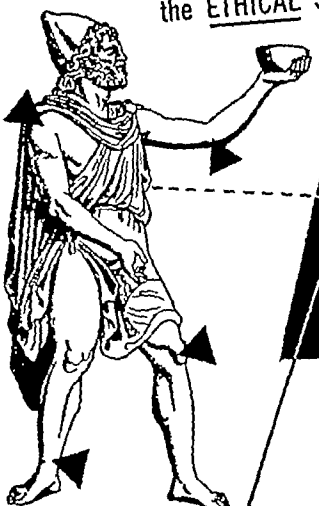
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VOLUME 48 NOVEMBER 1 1948 NUMBER 21

Editorials

Vulnerability of Hospitals

News stories recently in the daily press have told of the moving of an aircraft manufacturing plant from Connecticut to Texas, and of the recent building of underground plant facilities, as a part of the realistic national security program While these changes relate to manufacturing plants and anticipate the possibilities of the use of the newer atomic weapons, the question naturally arises What of medical institutions in high risk areas? In the State of New York this question would seem to be of particular validity where, in numerous places, consolidation of hospital, teaching and outpatient facilities has resulted in towering structures This centralization, with its dependence upon uninterrupted flow of power, supplies of all kinds, medical and nursing personnel, and particularly of transportation, is surely highly vulnerable

While industrial installations can be moved and time permitting, be operated underground, the medical centers existing at present serve the imperative daily needs of vast populations To do this they must run uninterruptedly day and night to full capacity Local disasters in previous times occasionally have been of considerable magnitude but there have been available all the medical resources and facilities necessary to deal quickly with them

Contamination of supplies and personnel on a large scale either by poison gas or radioactivity, in addition to demolition has not been encountered domestically Medical aid and continuity of medical service have been freely available.

The evolution of modern warfare increasingly has involved civilian populations European experience with the wartime destruction of installations and disruption of facilities has been far more intimate than ours, which has been practically nil How long will we be so fortunate? And as far as New York State is concerned, what provision can be made to anticipate the possible early loss of such medical facilities in high risk areas in the event of attack? Presumably any future aggression would come without warning

Since present facilities and such additional building as has been previously authorized will be dedicated to the maintenance of ordinary peacetime service, any special provisions to meet war conditions would have to be in addition to present extension of surface planning Little discussion of such plans has been heard Should more attention be given by medical men to this phase of a future wartime problem? Its complexity and difficulty would seem to warrant it

Current Editorial Comment

Expert Testimony On the subject of teachers of medicine, two categories have developed the practical and the cloistered Some have considered the cloistered teacher not to the best interest of the profession For example

> Thomas Lewis clearly foresaw such a danger and warned against it, but it is clear that the presence in the modern medical school of two categories of teacher, the practicing consultant and the salaried academic teacher, opens the door to this disastrous dichotomy The practicing teacher is familiar in his everyday work with the individuals seen against the backgrounds of his home, his family, and his work. The full tide of human needs and distresses bears down upon him daily, and the arts and technics of medicine are his constant and exhausting preoccupation He may cease to look beyond them
>
> For the cloistered academic teacher, life is different He gets his patients washed and tidied and laid out in rows in hospital wards, their importunate and exacting wives and mothers-in-law do not intrude upon his profound cogitations No unpleasant smells or noises break in on his ordered eloquence, house physicians and nurses wait on his bidding and tremble at his voice, and all those seeming irrelevances, so necessary to the balanced comprehension of the patient's total situation, are carefully tidied away out of his sight He does not miss them, for he has never known them He is rather like the florist who can arrange the plucked blooms, from which the dead leaves and the dirty roots have been removed and the earwigs shaken off, into all the combinations of form and colour his fancy dictates [1]

Lest some may have missed seeing the above through inadvertence, we call attention to it again as an example of courageous criticism of present day medical education from an English author It would appear to be a warning of general applicability and considerable seriousness The contact of the salaried, academic teacher of medicine with the student body is early, close, and precise Unquestionably he has a function to fulfill in the modern development of medicine, both in its undergraduate and graduate instruction The matter is one of proportion The practicing physician or consultant has a teaching function perhaps even more invaluable, as Thomas Lewis indicates Applied medicine seems still to be the ultimate goal of the profession Should not the young doctor be so instructed?

It gives us great pleasure to reinforce the verdict of the British author—and our own—by a quotation from Dr F C Shattuck He speaks of Sir William Osler, universally conceded to have been the great teacher of his day Oddly enough, the quotation appears as the foreword to the second volume of Dr Harvey Cushing's *Life of Sir William Osler* [2] Possibly Dr Cushing was responsible as much as any man in this country for taking the teaching of medicine out of the world, where Sir William kept it as a living subject, and putting it in the cloister, in the hands of full-time professors, where it becomes daily more attentuated and anemic

> To no member of its body today does the profession of medicine owe so great a debt—not that humanity is not also deeply in his debt Jenner or Pasteur has his first mortgage on mankind, his second on men of medicine With Osler the order is reversed *He has made no profound or fundamental discovery* (the italics are ours), but no one of our day, in his life, teaching, and example, so radiated, far and near, an inspiration to his fellow physicians Wide and accurate learning, enthusiasm in the pursuit of truth, a character in

[1] Walshe F M R Teachers of Medicine Lancet 2 817 (Dec 6) 1947 As quoted in J A M A 137 1190 (July 31) 1948

[2] Cushing Harvey Life of Sir William Osler Foreword to Vol 2 Oxford at the Clarendon Press 1925

which elevation and charm are singularly marked and rarely blended a personality which wins perforce the love, admiration, and respect of all who come within his influence a kindly eye which sees the good in every man and thus stimulates him to better it—these are the threads woven into the fabric of his beautiful life. Who that meets him, who that reads his essays and addresses, in particular, does not come forth or rise with renewed strength and hope to the service of his fellow man, a better soldier in the medical corps of the Divine army?[2]

[2] Shattuck F C: A Vigorous Medical Septuagenarian 1919.

100,000,000 Volt X-Rays Experiments with 100,000,000 volt x rays on a "phantom" patient indicate that these high voltage x-rays, produced by the betatron, may prove of great value in cancer therapy because of their high penetrating power and lower surface absorption as they pass into matter

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The tests revealed, the report states, that the depth of maximum absorption of the rays, where they have most effect, increases with voltage At about 2,000,000 volts the maximum depth of absorption was found to be less than half an inch below the surface At 20,000 000 volts it is about an inch, at 50,000,000 nearly three inches, and with 100 000,000 volts it is four inches

The construction of a special 5,000,000 volt medical betatron was announced recently by the G E Research Laboratory [1]

With penetration of this order and relatively low surface absorption, cancer and other research should be materially assisted With the likelihood of more machines and even higher voltage operation being shortly in use, recent warnings about the hazards of x-rays are pointed up [2] Particular attention should be paid by the medical profession to available literature concerning precautions to be taken, not only with respect to x radiation and its use in fluoroscopy, but also regarding radium radium emanations and radioactive isotopes

[1] New York Times, Sept. 22, 1948.
J.A.M.A. 138: 214 (Sept. 18) 1948, and New York State J Med 48: 1578 1601 (July15) 1948.

Have Your Cake A few days ago we received an advertisement from a reputable drug firm Its wording was so subtle, so insidiously attractive that with a shudder we threw it in the waste basket It recalled memories of Moose McCormick, who told us that when he went on trench raids his favorite weapon was a baseball bat "It's handy," he explained simply "I know how to use it, and besides, I'm afraid of firearms"

So are we And afraid of drugs But since that advertisement hit the bottom of the waste basket our subconscious mind has been at work. The two main components of the miracle tablets advertised were benzedrine and phenobarbital Benzedrine *peps you up It is practically the nearest* approach to a true intellectual stimulant since cocaine Phenobarbital soothes the nerves, when worries are at work, when in the early hours of the morning the brain will not relax When you toss from one side of the pillow to the other, when your wife gets up and goes to sleep upon the living room sofa, what is needed then? Why a little phenobarbital, of course

We are no pharmacist, but the action of the preparation must be something like this. The benzedrine acts at once Assume you are going to a party No sooner have you crossed your host's threshold than your brain begins to scintillate and snap After a few hours of intellectual electricity, your system begins to feel the need of sleep Then it is that the phenobarbital, doubtless through delayed absorption capsules, begins to seep insidiously into the chinks of your supercharged intellect You yield to your wife's entreaties and go home No sooner does your head touch the pillow than off you go into a dreamless slumber, to wake the next morning as fresh as if your brain had never been overstimulated by benzedrine, nor lulled into lethargy by phenobarbital

It sounds wonderful doesn't it? But if you have a bit of earthy skepticism left, will you resist the enticement of the advertiser's words? Will some trace of conscience—that hideously outmoded word—rise from your subconscious mind to tell you that eventually you pay for what you get? That there is no intoxication without its hangover?

We are glad we have forgotten the name of those tablets They pander to one of the most sinister proclivities of this precarious generation



The President's Page

Disaster Preparedness

IN THE absence of any certain guarantee of peace, the medical profession, necessarily realistic, must contemplate its obligation to the nation in the event of attack with atomic weapons It must do so in advance of aggressive action, not by choice but of necessity

As doctors, we have a far greater responsibility in the preparation for the possible outbreak of war than any other group, aside from the armed services This is so because the character of war has changed The front lines no longer will be scattered over remote parts of the globe War in the future will be brought to our front door Civilians, by no choice of their own, will become combatants Main Street will become an important target on every military map As members of the largest state medical organization in the nation, we owe it to our great population and to ourselves to give serious thought to what we are faced with, what we have to do to meet it and how we are going to marshall our resources to the best advantage A fundamental fact that emerges is that it will be the civilian doctor upon whom the brunt of atomic defense in its medical aspects will fall

By their explosive power alone, the new atomic weapons can deal death and destruction on a greater scale than the world has ever known before But when we add the effects of nuclear fission, with its radiation of neutrons and gamma rays and their consequent corrosive effect upon human life, we might have a catastrophe of staggering proportions It is quite apparent that no single community is going to be in the position to solve the problem The situation calls for cooperation on a state-wide basis, and even beyond state lines

If we are properly organized, we will know how to deal with the burns, shocks, fractures, and internal injuries among these casualties, just as in any disaster But no previous disaster has brought forth the complications of radioactivity The number of the radiation casualties in any area will depend on geographic and topographic factors Available medical observations indicate that, if any significant proportion of exposed individuals are to be saved, large numbers of whole blood transfusions will be necessary Leaving aside for the moment, the question of the supply of blood, who is going to do the screening that will determine which of the radiation casualties will receive the whole blood? No one but the civilian doctor or trained technician will be able to do it, and at this time I doubt whether the number of those having the training and experience is sufficient None of these problems can be left until disaster strikes

Imagine the problems facing the civilian doctor as he is mobilized from the surrounding country to work with sanitary engineers and with those charged with the evacuation and feeding of people of all ages from the stricken area Do not forget that much of the medical equipment as well as a great many doctors, nurses and ancillary personnel, may not be available after a visit from an atomic bomb! All medical personnel and equipment must be made available from nearby areas at once, to care for physical injuries, and shock—mental as well as physical The estimation of the effect of radioactivity in individuals, as well as the persistence of secondary radiations in materials, has to be made with all possible speed There is, in addition, the problem of bringing in large quantities of fresh whole blood, which presupposes supply in readiness at some accessible location

I urge all of you to give some serious thought to what you, as an individual, and also as a member of your county society, can do to lay the groundwork for thorough medical preparedness Perhaps the most important single step is for each one of us to come to a realization of the magnitude and importance of atomic warfare and the technical requirements for minimizing its effects After that, everything we do to inform ourselves of the technical and administrative difficulties involved will bring us nearer to a practical solution

I am not one of those who believe that the probability of atomic bomb attacks are either so remote that nothing *has* to be done, or so immediate that nothing *can* be done I feel it my duty therefore to write these lines

I sincerely hope that the uneasiness that grips the world will fade away, that we will find a peaceful way to solve national and international differences, that the miracle of atomic energy will be turned off the path that leads to destruction and be devoted to the improvement of the condition of man Finally, I hope that we whose profession it is to heal will not be called upon to put a crutch under a dying civilization It is a hope I am sure you all share with me

LEO F SIMPSON, M D

FACTS ABOUT NUTRITION

Prepared by the School of Nutrition, Cornell University, Ithaca
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Recommended Dietary Allowances 1948

On this page the revised recommended dietary allowances of the Food and Nutrition Board, National Research Council, with the original explanatory notes, are reprinted While the National Research Council Reprint and Circular series No 120 is recommended for those who desire a more comprehensive discussion, it is believed that the table and footnotes given here are adequate to guide physicians in most of their diet prescriptions

It is the desire of the Board that "the table be understood as representing levels of nutrient intakes which are desirable goals or objectives" They are not called requirements because they are designed to cover substantially all individual variations in the needs of normal people, rather than merely

RECOMMENDED DAILY DIETARY ALLOWANCES
Revised 1948
Food and Nutrition Board National Research Council

	Calories[a]	Protein (Gm.)	Calcium (Gm.)	Iron (Mg.)	Vitamin A (I.U.)	Thiamine (Mg.)[d]	Riboflavin (Mg.)[d]	Niacin (Nicotinic Acid Mg.)[d]	Ascorbic Acid (Mg.)	Vitamin D (I.U.)
Man (154 lb., 70 Kg.)										
Sedentary	2 400	70	1 0	12	5,000	1 2	1 8	12	75	/
Physically active	3,000	70	1 0	1	5 000	1 5	1 8	15	75	/
With heavy work	4 500	70	1 0	12	5,000	1 8	1 8	18	75	/
Woman (123 lb 56 Kg)										
Sedentary	2,000	60	1 0	12	5 000	1 0	1 5	10	70	/
Moderately active	2 400	60	1 0	12	5,000	1 2	1 5	12	70	/
Very active	3,000	60	1 0	12	5,000	1 5	1 5	15	70	/
Pregnancy (latter half)[e]	2,400[e]	85	1 5	15	6 000	1 5	2 5	15	100	400
Lactation	3 000	100	2 0	15	8 000	1 5	3 0	15	150	400
Children up to 12 years[b]										
Under 1 year[f]	110/3 2 lb. (1 Kg.)	3 5/2 2 lb. (1 Kg.)	1 0	6	1,500	0 4	0 6	4	30	400
1–3 years (29 lb., 13 kg.)	1,200	40	1 0	7	2 000	0 6	0 9	6	35	400
4–6 years (42 lb., 19 Kg)	1 600	50	1 0	8	2,500	0 8	1 2	8	50	400
7–9 years (55 lb., 25 Kg.)	2 000	60	1 0	10	3,500	1 0	1 5	10	60	400
10–12 years (75 lb., 34 Kg.)	2 500	70	1 2	12	4,500	1 2	1 8	12	75	400
Children over 12 years[b]										
Girls										
13–15 years (108 lb., 49 Kg.)	2 600	80	1 3	15	5 000	1 3	2 0	13	80	400
16–20 years (119 lb., 54 Kg.)	2 400	75	1 0	15	5,000	1 2	1 8	12	80	400
Boys										
13 15 years (103 lb., 47 Kg.)	3,200	85	1 4	15	5 000	1 6	2 0	15	90	400
16–20 years (141 lb., 64 Kg.)	3,800	100	1 4	15	6,000	1 7	2 5	17	100	400

Objectives toward which to aim in planning practical dietaries. The recommended allowances can be attained with a good variety of common foods which will also provide other minerals and vitamins for which requirements re less well known.

[a] Calorie allowances must be adjusted up or down to meet specific needs. The calorie values in the table are therefore not applicable to all individuals but rather represent group averages. The proper calorie allowance is that which over an extended period will maintain body weight or rate of growth at the level most conducive to well being.

The allowances depends on the relative amounts of vitamin A and carotene. The allowances of the table are based on the premise that approximately two thirds of the vitamin A value of the average diet in this country is contributed by carotene and that carotene has half or less than half the value of vitamin A.

[d] For adults (except pregnant and lactating women) receiving diets supplying 2,000 calories or less, such as reducing diets, the allowances of thiamine riboflavin, and niacin may be 1 mg., 1.5 mg and 10 mg., respectively The fact that figures are given for different calorie levels for thiamine, riboflavin, and niacin does not imply that we can estimate the requirement of these factors within 500 calories, but they are added merely for simplicity of calculation. Other members of the B complex also are required, although no values can be given. Foods supplying adequate thiamine, riboflavin and niacin will tend to supply sufficient of the remaining B vitamins

There is evidence that the male adult needs relatively little iron. The need will usually be provided for if the diet is satisfactory in other respects

[f] For persons who have no opportunity for exposure to clear sunshine and for elderly persons the ingestion of small amounts of supplementary vitamin D may be desirable. Other adults probably have little need for such supplements

[e] During the latter part of pregnancy the calorie allowance should increase approximately 20 per cent above the preceding level. The value of 2 400 calories represents the allowance for pregnant, sedentary women.

[b] Allowances for children are based on the needs for the middle year in each group (as 2 5 8 etc.) and are for moderate activity and for average weight at the middle year of the age group.

[c] Needs for infants increase from month to month with size and activity The amounts given are for approximately six to eight months. The dietary requirements for some of the nutrients such as protein and calcium are less if derived largely from human milk.

the requirements of average individuals Using average needs as a basis would result in many being underfed On the allowance basis, however, many will doubtless receive levels in excess of their individual needs and thus the failure of an individual to meet these allowances does not mean by itself that he is malnourished On the other hand, it should be emphasized that the allowances are designed for normal people and that higher levels are needed to correct deficiency states

Further Recommendations Accompanying Recommended Daily Dietary Allowances

Fat There is available little information concerning the human requirement for fat Fat allowances must be based at present more on food habits than on physiologic requirements While a requirement for certain unsaturated fatty acids (the linoleic and arachidonic acids of natural fats) has been amply demonstrated on experimental animals, the human need for these fatty acids is not known In spite of the paucity of information on this subject there are several factors which make it desirable that fat be included in the diet to the extent of at least 20 to 25 per cent of the total calories, and that the fat intake include "essential" unsaturated fatty acids to the extent of at least 1 per cent of the total calories At higher levels of caloric expenditure, e g , for a very active person consuming 4,500 calories and for children and adolescent persons, it is desirable that 30 to 35 per cent of the total calories be derived from fat Since foodstuffs such as meat, milk, cheese, and nuts may be expected to contribute "invisible" fat to the extent of from one-half to two-thirds of the total amounts of fat implied by the above proportions of the total calories, it is satisfactory to use separated or "visible" fats such as butter, margarine, lard, and shortenings only to the extent of one-third to one-half of the amounts indicated

Water A suitable allowance of water for adults is 2 5 L daily in most instances An ordinary standard for diverse persons is 1 ml for each calorie of food Most of this quantity is contained in prepared foods At work or in hot weather, requirements may reach 5 to 13 L daily Water should be allowed *ad libitum*, since sensations of thirst usually serve as adequate guides to intake except for infants and sick persons

Salt. The needs for salt and for water are closely interrelated A liberal allowance of sodium chloride for the adult is 5 Gm daily, except for some persons who sweat profusely The average normal intake of salt is 10 to 15 Gm daily, an amount which meets the salt requirements for a water intake up to 4 L daily When sweating is excessive, one additional Gm of salt should be consumed for each liter of water in excess of 4 L daily With heavy work or in hot climates 20 to 30 Gm daily may be consumed with meals and in drinking water Even then, most persons do not need more salt than usually occurs in prepared foods It has been shown that after acclimatization persons produce sweat that contains only about 0 5 Gm to the liter in contrast with a content of 2 to 3 Gm for sweat of the unacclimatized person Consequently, after acclimatization, need for increase of salt beyond that of ordinary food disappears

Iodine The requirement for iodine is small, probably about 0 002 to 0 004 mg daily for each kilogram of body weight, or a total of 0 15 to 0 30 mg daily for the adult This need is met by the regular use of iodized salt, its use is especially important in adolescence and pregnancy

Phosphorus Available evidence indicates that the phosphorus allowances should be at least equal to those for calcium in the diets of children and of women during the latter part of pregnancy and during lactation In the case of other adults the phosphorus allowances should be approximately 1 5 times those for calcium In general, it is safe to assume that if the calcium and protein needs are met through common foods, the phosphorus requirement also will be covered, because the common foods richest in calcium and protein are also the best sources of phosphorus

Copper The requirement for copper for adults is about 1 to 2 mg daily Infants and children require approximately 0 05 mg for each kilogram of body weight The requirement for copper is approximately one-tenth that for iron A good diet normally will supply sufficient copper

Vitamin K The requirement for vitamin K usually is satisfied by any good diet except for the infant in utero and for the first few days after birth Supplemental vitamin K is recommended during the last month of pregnancy When it has not been given in this manner, it is recommended for the mother preceding delivery or for the baby immediately after birth

Folic Acid. Evidence for recognizing folic acid (pteroylglutamic acid, vitamin B_c, L casei factor or vitamin M) as an essential human nutrient is presented in the text The quantitative requirement cannot be closely estimated from evidence published to date

Scientific Articles

THE OUTLOOK FOR PATIENTS ADMITTED TO A MENTAL HOSPITAL AFTER THE AGE OF SIXTY

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(From the New York Hospital Westchester Division)

IT IS not infrequently assumed that persons who develop or suffer recurrences of mental disorders in their later years are likely to have poor prospects for recovery The steady extension of life expectancy, with its great increase in the actual as well as relative number of older people, directs attention to the important problem of their ability to respond to psychiatric treatment with subsequent capacity for social adjustment and usefulness

In relation to this question a careful study was made of the case histories of the 365 patients who had passed their sixtieth birthdays at the time of admission to the New York Hospital, Westchester Division during the ten-year period from January 1, 1936, to January 1, 1946 In January, 1948, a follow-up of the course of these patients was attempted, covering a period of at least two years subsequent to the most recent admissions In order to obtain objective information, letters of inquiry were written to the relative or friend who had been responsible for each patient during the period of hospital treatment. In some cases information had to be obtained from other hospitals in which patients were known to have been received after leaving here It would be expected that the information available regarding this group of patients would be somewhat limited by natural circumstances with relation to a period of time extending back in some instances nearly twelve years following hospitalization Nevertheless, 116 answers were received giving specific follow-up information over a period of from two to eleven and a half years. In addition to this, the course of 112 patients was known from our records for a period of up to two years after the patient had left the hospital The majority of the latter reports corresponded with progress notes made up to the time of actual discharge from the hospital when the patient had been at home on extended visit for our customary periods of six months or a year The courses then, of 228 patients or 62.4 per cent of the whole group were known after periods of up to eleven and a half years in several instances following hospital residence.

This hospital is a voluntary hospital whose policy is to accept acutely ill patients who are considered recoverable. A small proportion is accepted with mental disturbances related to the organic brain pathology associated with advancing years The average age of all patients admitted during the ten-year period studied was forty years The 365 consecutively admitted patients who had passed the age of sixty comprised 10 per cent of the total number of patients admitted during that period

A brief description will indicate the type of patient found in the group under consideration. Of the 365 patients studied, 218 were women and 147 were men. With regard to age, 268 patients, or 73 4 per cent, were in their seventh decade 82, or 22.4 per cent, were in their eighth decade, and 15 or 4 2 per cent, were in the ninth decade of life. The majority of the patients, numbering 224 or 61 per cent were admitted to the hospital on a voluntary' basis, while 141 were on some type of certification The domestic background revealed that 188 or 51 6 per cent were married 27 9 per cent were widowed 10 9 per cent were single and 3 6 per cent were divorced

The histories indicated that these patients were of normal or superior intelligence with the exception of one woman who was considered borderline in this respect They were generally well educated with a considerable proportion

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having received college training The majority of them had been successful in occupations of responsibility in many fields As might be expected, most of the women were housewives, although 27 had supported themselves in business or professions from which eight of them had retired

The majority of the men had been engaged in business pursuits, while there was a substantial number representing the professions Twelve of these were physicians, 11 were lawyers, and four were clergymen The group also included six engineers, several architects, artists, college professors, and teachers Four patients had had no occupation Twenty-eight of the men, making a total of 36 in the whole group, had retired for varying periods previous to admission

Naturally, many different types of mental disorders were represented among these patients Although organic brain disease plays an increasing role in persons past the age of sixty, it should be considered that chronologic age alone is not necessarily an index of the presence or extent of organic brain pathology The appearance of such organic changes is a matter individual to a particular patient

Since the mental changes encountered here make up a diverse group, perhaps some liberty will be allowed in separating them simply and intelligibly into organic and functional reactions The organic disorders will include those mental conditions ordinarily considered to be dependent on chronic organic or toxic changes in the brain which have been demonstrated to be present in such cases Clinically, the characteristic symptoms are memory defect, disorientation, emotional lability, impairment of comprehension and judgment, fluctuation of attention, and at times a delirium The reactions considered to be functional are characteristic syndromes which show no demonstrable brain pathology

The organic psychoses included 128 patients or 35 1 per cent of the entire group Seventy-six, or 29 9 per cent, had psychosis with cerebral arteriosclerosis, while 33, or 9 per cent, suffered from senile psychosis These two groups totaled 83 6 per cent of all patients who had organic reactions The remainder of the organic mental conditions were miscellaneously distributed with five cases of alcohol or drug addiction with psychosis, three patients with well-advanced syphilitic meningo-encephalitis, two with psychosis associated with paralysis agitans, one associated with brain tumor, one epileptic clouded state, one with psychosis associated with diabetes, one with psychosis due to illuminating gas poisoning, and five patients with psychosis associated with other disturbances of the circulation and related to cardiovascular-renal disease Such conditions were not infrequently associated with a delirium

The 76 patients over sixty years of age who suffered from psychosis with cerebral arteriosclerosis consisted of 27 men and 49 women whose median age was sixty-nine years The oldest patient was eighty-six The median duration of illness before admission to the hospital was six months The median length of hospital treatment was one year and three months, while the longest period was eight years

The follow-up, ranging from two months to ten years, showed that seven of these patients suffering from psychosis with cerebral arteriosclerosis had eventually made a recovery, eight had become much improved, and 19 improved The 15, or approximately one fifth of the whole group of 76 who were either recovered or much improved, adjusted very comfortably at home, while two returned to work These results compare with a previous report from this hospital on 100 patients suffering from psychosis with cerebral arteriosclerosis in which 23 per cent were found to have been either recovered or much improved

As in the previous report, the patients who did well were, for the most part, those in whom the more delicate adjustment of the patient with cerebral arteriosclerosis appeared upset by emotional or toxic factors and in whom the psychosis disappeared when treatment was directed toward alleviating these precipitating factors It was also noted in the present study that all of these patients who did well were those who had good resources in that they had something to return to in the way of security and a family who wished to care for them Of course, many who had these resources did not do well, perhaps because their actual permanent organic involvement was too great for restitution of their mental adjustment

Patients are considered recovered who are completely well and able to carry on their work or other activities in the usual manner The patient who is socially adequate at home but shows slight residual limitations is termed much improved Improved patients are those who are more comfortable in the hospital or perhaps at home with nursing care

The patients with senile psychosis numbered 33, of whom 20 were women and 13 were men The median age on admission was seventy-six The oldest was eighty-five, and the youngest was sixty The median duration before admission was two years and six months The median hospital residence was seven months and three weeks These patients were with one exception, feeble, and all showed characteristic mental deterioration

This group of patients showed little capacity for definite improvement. Fifteen died account ing for more than one quarter of all deaths occurring in the hospital in this age group One woman of seventy-six in whose illness definite adequate emotional factors were present became much improved and remained so until she died at home a year later Five patients were improved and ten unimproved on leaving the hospital while two remained in the hospital unimproved after four and five years. Follow-up reports obtained in ten cases indicated that when last heard from one was at home much improved after two months, eight had died within a year, and one was in a nursing home unimproved after two years.

Of the remaining 19 patients with organic types of mental disorder, all had conditions of toxic or infectious nature Five of these were suffering from psychosis with cardiorenal disease with symptoms of organic delirium. Their median age was sixty five The median period of hospital residence was two months One patient died in the hospital, two were considered recovered, and two were improved at the time of leaving the hospital Follow-up reports showed that one of the recovered patients remained recovered after ten weeks, while the other returned to work remaining well for ten months when she died of coronary disease Four patients had psychosis associated with drugs In two instances the drugs were barbiturates and in two bromides were responsible All suffered from a drug delirium. The condition in all cases was associated with a history of the use of sedatives and not due to longstanding drug addiction The median length of hospitalization was three months All four patients were considered recovered when they left the hospital Follow-up information over periods of from one month to eleven and a half years showed all to have remained recovered The patient on whom a report was received after the eleven and a half year period remained well at eighty

Only one patient in this age group was admitted with psychosis due to alcoholism. He was sixty-eight years old and had been ill for eighteen months After six weeks he was transferred to another hospital where he was reported after six years to remain unimproved

Miscellaneous chronic organic conditions accounted for mental disorders in the nine remaining patients, of whom three died in the hospital while two were much improved two improved and two were unimproved

In all patients studied mental disorders distinguished by features generally considered as functional and without demonstrable evidence of organic brain changes numbered 237 or 65 per cent of the whole group These consisted of 111 patients with the various types of manic-depressive psychosis, which represented the largest diagnostic group, and accounted for 30 4 per cent of the total Also included in the functional group were 53 instances 14.5 per cent with involutional psychosis, of whom 46 had melancholia and 7 were of the paranoid type Forty nine or 13 4 per cent of all patients suffered from the psychoneuroses Twelve patients, or 3.3 per cent, were diagnosed as suffering from either alcoholic or drug addiction without psychosis with the condition related to their difficulties in personality adjustment There were eleven patients, or 3 per cent of the whole number of patients, with exacerbations of well established dementia praecox reactions. One patient had a long history of psychopathic personality with pathologic sexuality without psychosis

In considering the group of patients with manic-depressive psychosis, we find that 71 were women and 40 were men. Forty-one patients with manic-depressive psychosis mixed type required the longest period of hospitalization of any of the manic-depressive types with a median time of nine months. Thirty three had had previous attacks, while eight had not Thirty four patients with manic-depressive, depressive conditions had the shortest period of hospital residence, with a median of time of four months and three weeks All of these had recovered from previous attacks. Manic-depressive circular reactions were 22 in number and included 16 women and six men. Thirteen of these were known to have had previous attacks while eight had not The median length of hospitalization in this group was eight months Fourteen patients, of whom eight were women and six were men had manic-depressive psychosis manic type, with a median time of eight and one-half months hospitalization. From the standpoint of a manifestation of outward aggressiveness rather than depression in meeting the difficulties of later years it is psychologically interesting to note that three men and three women or a total of six out of 14 in this group experienced their first attack of mental illness after they had passed the age of sixty All of the patients with depressive episodes had had previous attacks

Of the manic-depressive group as a whole, 5 per cent in this age group died in the hospital At the time of leaving the hospital, 43 per cent were recovered 22 per cent were much improved 18 per cent were improved and 12 per cent were unimproved A total of 72 patients or 65 per cent of the manic-depressive group as a whole were recovered or much improved and

were able either to return to their work or to live comfortably at home No significant difference appeared in this group in the outlook for those who had had previous attacks as compared with those who were having their first attack of manic-depressive psychosis, manic type

Follow-up studies were available in 93 patients in this group after periods of from two months to nine and a half years Of these, 60 were known to be recovered after a median period of two years and eight months Of eight patients last heard from after seven years, six remained recovered, one died, and one was unimproved One woman, now aged eighty-two, remains recovered after four years and three months and has continued to be very active in club and other social work

Involutional psychoses were responsible for 53, or 14 5 per cent of this age group, with 31 women and 22 men The median age of the patients was sixty-three years The median length of hospital stay was seven and a half months Two patients died in the hospital, seventeen were recovered, ten were much improved, fifteen were improved, and nine were unimproved A total of 27, or approximately half of the patients, were either recovered or much improved Follow-up reports in 46 instances over a period of from six months to nine and a half years showed that 21 had achieved recovery, of whom four had relapsed, six were much improved, three improved, and six were unimproved Seven of this group had died at the time of follow-up

Involutional psychosis as it appears in this group can be thought of as a fairly uniform and consistent disorder which lends itself to a consideration of some of the prognostic factors Symptoms, usually of a severe agitated depresssion, occur at some time in middle life or later, in a characteristically rigid personality with relation to certain typical psychologic problems of readjustment incident to advancing years Physical problems play their part, but there is no demonstrable evidence of organic brain involvement Any conception that this condition is caused essentially by endocrine changes does not seem very helpful to understanding the depressive or sometimes paranoid features of the disorder, as they are characteristically observed to relate to emotional difficulties in adjustment to changes in the patient's life situation Endocrine as well as many other factors may at times play a part Involutional psychosis is considered here to be primarily rather than secondarily an emotional problem

A careful examination of the records indicated that adequate external precipitating factors occurred in 42 of the patients admitted with involutional psychosis That is to say, some loss or threat was suffered which might reasonably be expected to cause deep concern to the patient Often this was unwanted retirement from work, financial loss, or some disturbance in the person's usual rigid way of life In several instances it was the threat of an incapacitating physical condition

The adequacy of the precipitating causes, considered together with the resources of the patient, appears to be a valuable feature in estimating the capacity of the patient to make and maintain a recovery In the group of 21 patients with involutional psychosis found on the follow-up to have recovered, precipitating factors were considered adequate in 19 and inadequate in two In the cases of the two patients with inadequate precipitating causes, both patients relapsed in a short time In attempting to evaluate the resources of patients in terms of a history of an adequate prepsychotic personality, reasonable financial security, and a good social or domestic situation to which he or she could return, it was considered that in eight cases the resources were only fair Of these, four patients had relapsed at the time of follow-up, while four remained recovered In the 14 patients whose resources were considered poor, none were recovered, two were much improved, seven were improved, and five were unimproved on leaving the hospital In the follow-up over a nine and a half year period, reports were received on nine, indicating that eight were unimproved and only one was much improved On the other hand, in 13 patients where the external precipitating causes were considered adequate and the resources good, 12 patients were recovered at the time of follow-up, while only one had relapsed

The relation of the patient's resources or of having an incentive to get well was noted as an important factor in psychosis with cerebral arteriosclerosis It was also important in the manic-depressive, depressive, and mixed types, where, of 17 patients considered to have poor resources, only two were recovered, two were much improved, five were improved, and eight were unimproved on leaving the hospital Follow-up reports on 15 of these patients up to a period of six and a half years showed that one had remained recovered for a year and five months and two were improved, while the remaining 12 continued unimproved or relapsed from the degree of improvement achieved in the hospital The course of these patients is to be compared with the 47 patients reported completely recovered in the case of 66 similarly followed in the manic-depressive, depressive and mixed groups, as a whole

Metrazol, and more lately electric shock, was

used for 30 patients who had either manic-depressive, depressive, or mixed reactions, and for 16 patients with involutional psychosis melancholia, making a total of 52 patients receiving this treatment in the age group Of the patients who were considered to have poor resources, seven received electric shock therapy with two much improved on leaving the hospital, while four were improved and one was benefited only briefly When last heard of up to a period of six and a half years in the case of five none were recovered or much improved, while only two were improved and three were unimproved The remaining 35 patients who were considered to have fair or good resources responded much more favorably with 32 progressing to recovery with only five relapses known in the 28 patients reported in a follow-up *period of six and a half years*

In considering the 49 individuals with psychoneuroses or 13 4 per cent of studied admissions, the median age was found to be sixty five Eight patients were seventy or more of whom the two oldest were seventy nine Twenty five, or more than half, gave no history of previous attacks, while the remaining 24 individuals had suffered from one to ten previous episodes. The median duration of illness before admission was four months, while the median period of hospital treatment was three and a half months Twenty three patients had psychoneurosis of the mixed type, of whom four were recovered, eleven were much improved six improved, and two were unimproved at the time of leaving the hospital The patients with reactive depressions showed the best improvement, with ten of 16 recovered four much improved, and two improved None of the four patients with hypochondriasis recovered, while one was much improved, two were improved, and one unimproved One patient with an anxiety state died of a coronary attack two were much improved and one was unimproved Of two patients with psychasthenia one was much improved and one improved Thus 33 patients or approximately two thirds of the group made substantial recovery

After a follow-up of 34 patients extending to a period of nine and a half years 23 of the group were known to have recovered eight were much improved one was improved and two unimproved

The case report of a patient with psychoneurosis indicates strikingly and instructively the capacity of many elderly patients to return to an active and useful life.

Case Report

Case 1—A seventy-nine-year-old single professional man was admitted for treatment of his severe apprehension indecision, anxiety and depression of *four months duration He was a very successful* competent and cultured man whose history indicated neurotic episodes over a period of many years without previous hospitalization The present attack seemed partly precipitated by undue worry over rheumatoid arthritis in his left hand

On admission he appeared tense anxious and given to variable dramatic emotional display At times he was critical He could be temporarily reassured and at times could sit and talk pleasantly and reasonably He was discouraged but not suicidal. He talked with some pride of what he considered the baffling nature of his problem His recent and remote memory were good and he showed no evidence of organic mental involvement

His general physical condition was good with comparatively little evidence of peripheral or retinal arteriosclerosis His teeth required attention *Heart lungs and abdomen were negative except* for an appendectomy scar His blood pressure was 140/80 Some evidence of rheumatoid arthritis was present in his left wrist X ray studies of his wrist and chest were essentially negative. Clinical laboratory studies including urinalyses blood cytology chemistry and serology were essentially negative.

In the hospital he leaned heavily on his physician *for support* For his physical condition he received vitamin therapy and baking to his wrist with relief His mental condition improved slowly but steadily After six weeks he found that there were difficulties in his firm which he owned and that his associates required his help since he was the only one capable of straightening out the trouble. After some indecision he left the hospital on extended visit after two months residence. He soon became absorbed in the responsibilities of his business, which he salvaged and increased by the use of many new ideas He continued to live comfortably at his club A recent follow up after four and a half years reports that he is still interested, has unimpaired judgment manages the responsibilities of his work, appears younger and attends regularly to his office at the age of eighty three

A small group of eleven patients was admitted after the age of sixty of whom five were diagnosed as having without psychosis alcoholism and six as without psychosis drug addiction.

The average duration of the alcoholism before admission was three years. All patients left the hospital against advice after a median stay of three months At the termination of hospital treatment one was considered recovered two much improved and two improved Follow up reports on three indicated that one had remained recovered for three years before resuming alcohol The other two were still abstinent after six months

The six patients admitted with the diagnosis of without psychosis drug addiction had a median duration of addiction for six years and had con-

tinued for twenty years in two patients Three had been addicted to morphine, two to barbiturates, and one to codeine All left the hospital against advice after a median stay of two months Follow-up studies on four patients indicated that one morphine addict was much improved and working after five years, while another relapsed after four months One barbiturate addict was recovered for one year and then relapsed The other had continued without drugs for eleven months

Summary

The outlook for patients admitted to a mental hospital after their sixtieth year has been studied in a group of 365 such individuals consecutively admitted to the New York Hospital-Westchester Division during the ten-year period from January 1, 1936, to January 1, 1946 The median age of these patients was sixty-five years, the oldest of whom was eighty-six

Diagnostically, they represented a diverse group The larger proportion, or 64 9 per cent, suffered from reactions generally considered to be functional in type These included the involutional psychoses which appeared essentially to represent typical agitated and paranoid depressions arising in rigid personalities in response to changes in the life situation necessitated by advancing years In the remaining 35 1 per cent of patients the usual mental and physical evidences of psychosis associated with organic impairment of the brain were present

At the time of leaving the hospital the group as a whole showed 24 1 per cent to have recovered, 19 7 per cent to be much improved, 20 3 per cent improved, 21 4 per cent unimproved, and 14 5 per cent to have died in the hospital The outlook for those patients with conditions due to marked irreversible brain pathology would not be expected to be favorable Of the 33 patients with senile psychosis, none recovered, although one continued to be much improved for a year Of the patients with psychosis with cerebral arteriosclerosis, however, 15, or 19 7 per cent, showed substantial improvement with the ability to adjust adequately at home in a recovered or much improved condition Of four patients admitted with organic delirium due to drugs, all recovered

The patients with functional mental disorders showed marked capacity for recovery, particularly those in their seventh and eighth decades of life This was well shown in the large group of 111 patients with manic-depressive disorders, of whom 43 per cent were recovered and 22 per cent much improved on leaving the hospital In contrast, however, none of the eleven patients with well-established dementia praecox showed any great improvement

The material studied indicated the importance of adequate precipitating causes of illness and of the possession of good resources by the patient with regard to security and a favorable family situation in his ability to recover and remain well for an appreciable time

Apparently age was also a factor in recovery, with those in the seventh decade showing a greater tendency to recovery than those in the eighth or ninth decades of life Twenty per cent of the patients in their seventies were recovered, and 16 6 per cent much improved, as compared with 24 1 per cent recovered and 19 7 much improved in the group studied The 15 patients who were in their eighties at the time of admission showed no complete recoveries, but their illnesses were for the most part in this study associated with marked chronic organic brain disease

A case report was given indicating the recovery of a man from an episode of mental disorder which commenced at seventy-nine who has since continued recovered, and managed responsible work for the past four years

Discussion

George K Collier, M D , *Rochester*—Dr Clow brings to our attention the very large group of the aged who are so often forgotten after being placed in mental hospitals or homes for the aged He points to the ever-increasing number of old people resulting from the advances made in medicine and the better care provided both by State and private agencies Our New York State mental hospitals report 55 to 60 per cent of all their admissions as being over sixty-five years of age, in comparison to Dr Clow's figure of 10 per cent of all admissions to his hospital This disparity in the admission rate of the aged is due to the fact that the admissions to Dr Clow's hospital are a more or less selected group considered suitable for treatment, whereas the State mental hospitals are required by law to accept any and all patients who are properly certified for admission

As a result of changes in our social and economic life, and the contracting of the home, many of the aged who formerly were kept in the home are now sent to mental hospitals This resultant overcrowding has added to the worries of hospital directors, and some thought is now being given to the question of establishing special hospitals for the aged mental case Special geriatric hospitals to care for all types of the infirm aged, whether mental or physical, might be advisable, but we should make a further study before such a plan is adopted Tuberculosis and mental disease are the only chronic conditions now being cared for It might result in a more intensive isolation and an overspecialization Psychiatry is all inclusive, and it is only in our study of the full life span that we will be able

to evaluate properly the behavioristic changes in man Dr Clow has shown us what can be accomplished with a selected group He stresses the fact that age alone is not necessarily an index of the presence of organic brain pathology His patients were a group of successful men and women—architects, engineers lawyers, physicians clergymen—all of normal or superior intelligence who had been successful in their respective fields. He refers to an adequate precipitating factor some loss or threat an unwanted retirement financial loss or some incapacitating physical factor When we study our histories carefully we will find a similar cause. He shows us that, if this precipitating factor is recognized early, much can be done to bring about a fairly well-adjusted personality In evaluating such patients we should always look for their latent resources In a proper environment many of these reserves can be stimulated into activity Old desires and wishes can be brought to fruition As has been so aptly stated the man who balances and closes his books each and every day has but little to call upon when age creeps up on him. However that man who is mentally and physically active, assuming life's daily responsibilities, has so much left over from the day's work that these accumulations become of great value to him when physical impairments, financial loss and isolation come upon him

Dr Clow's paper should stimulate us to a more intensive study of our aged patient, and especially is this paper directed to the general practitioner who is in a position to observe the early emotional and toxic factors for which so much can be done We should have further study of the physiologic and psychologic changes in the aged In almost every community we have social agencies which can be called upon for assistance These include the home bureau services industrial workshops guidance centers, and the Red Cross all of which have occupational activities which can be of much therapeutic value to the aged

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FEVER THERAPY MAKES PENICILLIN MORE USEFUL AGAINST SYPHILIS

Artificially produced fever increases the effectiveness of the seven and a half day penicillin treatment for syphilis to more than 80 per cent, a substantial improvement over both penicillin alone and penicillin and mapharsen in combination for the same length of time

This valuable use of fever therapy is described by Herman N Bundesen, M D president of the Chicago Board of Health and a group of four doctors who assisted him, in an article which appeared in the July 31 issue of the *Journal of the American Medical Association*. Three of the doctors—George N Schwemlein research associate at the Kettering Foundation for Medical Research Cincinnati, Ohio, Theodore J Bauer senior surgeon of the United States Public Health Service and venereal disease control officer Chicago, Illinois and Robert M Craig of Dayton Ohio—together with Dr Bundesen pioneered the penicillin and penicillin-mapharsen treatments for syphilis.

In comparison with the 80 per cent effectiveness of penicillin and fever therapy in seven and one-half days their tests show penicillin 70 per cent effective and penicillin given with mapharsen a compound of arsenic, 49 per cent effective against syphilis in seven and one-half days

The fourth physician in the research group is Jack Rodriquez medical director of the Chicago Intensive Treatment Center, where the group tested the fever and penicillin method from January 4 through July 29, 1945

Each patient was given an injection of sodium penicillin every three hours for 60 doses plus three three-hour sessions of artificial fever on alternate days beginning twenty three hours after the penicillin was started.

Fever therapy however, does not cut down on the time required for penicillin treatment, the doctors found. When they gave patients the same amount of penicillin—1,200 000 units—in about thirty hours and reduced the fever therapy to one six-hour session the treatment was effective in only 60 per cent.

Neither is giving large amounts of penicillin without fever therapy more effective the article indicates citing research not yet completed. When patients were given 25 000 000 units of penicillin in twenty four hours during this research the drug was about 65 per cent effective

SCHIZENCEPHALIES WITH HYDROCEPHALUS· CLINICAL DIAGNOSIS OF SEVERE CEREBRAL AGENESIS

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IN 1946, Yakovlev and Wadsworth presented a very exhaustive study of congenital clefts in the cerebral mantle [1] The term "schizencephaly" was offered for use in separating these cerebral aplasias of formal origin from the porencephalies or acquired cerebral defects Cohn and Neumann suggested that "schistencephaly" would be more proper [2] Three of the cases studied and described were associated with severe hydrocephalus, in two this was absent

During the past two years three infants admitted to the hospital with hydrocephalus were demonstrated to be schizencephalic Subdural hematomata were suspected in all three

Case Reports

Case 1 —S A M , a seven-week-old girl, was admitted to the Children's Hospital of Buffalo, October 1, 1946, and the following history was obtained Birth was normal and spontaneous at full term After birth the infant cried a good deal and was irritable At three weeks of age it was discovered that the head was larger than normal X-ray studies of the skull and spine were negative There were no convulsions and no vomiting The patient took feedings well.

Examination revealed a very irritable, crying, well-nourished baby of seven weeks with enlarged head (circumference 17½ inches) whose bulging anterior fontanelle was seven inches wide A right divergent squint was present There was no blinking of the eyes when objects were brought suddenly toward them The right pupil was larger than the left The arms and legs moved freely Muscle tone was normal Tendon reflexes were present and equal No abnormal reflexes were recorded

Urinalysis and blood studies were negative Electroencephalography was reported as showing "very little true cortical activity "

Subdural punctures were made on October 8, 1948, and 20 cc of clear, colorless fluid were removed bilaterally The protein content of the fluid was 31 to 32 mg per cent Almost continuous crying persisted, and there were occasional generalized tremors The child vomited several times during the next twenty-four hours The anterior fontanelle remained depressed for two days

Attempts to make ventriculograms failed until October 20, 1946, when about 360 cc of xanthochromic fluid were replaced by an equal amount of air The films were not diagnostic There were large collections of air on either side of the falx occupying greater than 50 per cent of the cavity Indefinite tissue shadows were present in the occiput and posterior temporal regions Cerebral agenesis of marked degree was suspected, but large subdural hygromas could not be excluded

On October 21, 1946, a right frontotemporal craniotomy was performed by Dr W B Hamby His note in part reads, "A tremendous cavity was found filled with slightly opalescent, xanthochromic fluid This was removed with a suction tip, and into the bottom of the skull were seen projecting two white masses that proved to be the thalami The olfactory bulbs extended forward to their terminations beside the crista galli Behind the thalamus the right hippocampus was seen, and curving backward from it along the edge of the falx was a white curved rim of tissue Beneath and behind the thalamus appeared a small band of rather normal looking cerebral cortex This represented approximately the posterior half of the temporal lobe and a small amount of the occipital lobe, and it extended forward about 1 cm anteriorly to a group of veins that resembled Rolandic vessels entering the sagittal sinus Hanging from the groove behind the two thalami were two pink veil-like membranes, on the lower end of which appeared pink convoluted masses representing the choroid plexus One could see past the left thalamus the left hippocampus Beyond that one looked directly upon a thin membrane that lined the dura of the left side of the cranium The left meningeal artery could be traced from the sphenoid wing back up over the convexity The membrane representing the pia was opened just over the location of the optic nerves exposing the chiasmal area The right optic nerve appeared normal and across it coursed the anterior cerebral artery " At this point the exploration was terminated

The patient is still alive, blind, deaf, and unable to sit up There is no evidence of persistent hydrocephalus

Case 2 —R F S , a boy, 4 months of age, was admitted to the Children's Hospital of Buffalo, April 30, 1947, because of a "large head" and impaired vision The patient, a third child, full term, was delivered with forceps, following nine hours of labor There was no cyanosis, but the infant became jaundiced about the fourth day The child never appeared able to see At eight months the mother noticed that the arms and legs seemed stiff and the head larger than normal The patient was very irritable and cried much of the time There were no convulsions, but the child would shake its head as if it were "trying to shake off something " He had frequent choking spells, and he vomited occasionally during the first and second months Feeding and

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bowel habits were good The child has appeared to have had a ' cold since birth

As regards family history the mother had had poliomyelitis at the age of seven years Physical examination revealed a well-nourished boy with large head (18 inches in circumference) and bulging anterior fontanelle There was a downward converging squint, and the child did not blink when bright objects were brought suddenly to his face The pupils were regular and equal. (Reflex responses were not recorded.) The child did not react to loud noises. The neck was rigid and moderately extended. The arms were flexed while the legs were held in extension. The tendon reflexes were hyperactive but equal and Babinski responses were present bilaterally There was bilateral ankle and patellar clonus. Moro s clinging reflex was questionably positive Magnus and deKleyn responses were absent

Blood and urine studies were negative X ray studies of the skull revealed evidence of early hydrocephalus. Electroencephalograms showed none of the normal cortical activity which starts at this age

On April 30 1947, subdural punctures were performed, and 15 cc of clear colorless fluid with total protein content of 17 mg. per cent were removed bilaterally Traumatic spinal puncture was made (1,000 red blood cells per cu. mm) Total protein content was 368 mg. per cent (centrifuged specimen) On May 2, 1947, ventriculograms were made by inserting needles bilaterally to a depth of two and one-half inches at the lateral extremity of anterior fontanelle Seventy cc. of fluid were removed from the right side and replaced by an equal amount of air Two hundred thirty cc. of fluid were removed and replaced by an equal amount of air on the left. One cc. of phenolsulfonphthalein dye was injected on either side. X ray studies revealed the absence of a recognizable ventricular system. One could visualize a mass of intracranial tissue indefinitely outlined that suggested poorly developed left temporal occipital and midline occipital parietal lobes. The entire right cranial vault was lacking in demonstrable neopallium No dye appeared in cerebrospinal fluid collected in the lumbar region

On May 8, 1947 the discharge diagnosis was cerebral aplasia with hydrocephalus

At examination on April 14, 1948 the child was irritable and could not hold his head up He was blind and deaf There was no papilledema or optic atrophy now and Magnus and deKleyn reflexes were absent.

Case 5—S E. A a three-month-old girl, was admitted to the Children s Hospital of Buffalo September 13, 1947, because the infant s head seemed larger than normal Birth was three weeks premature and out of wedlock. Birth weight was 4 pounds and 15 ounces The baby was taken to foster parents one week later, after examination by a very competent podiatrician No abnormalities were found by him. From the second week of life the infant cried a great deal and seemed hungry most of the time. She sucked her hands continuously Five days before admission, the head seemed larger than normal On one occasion the foster mother thought the head transilluminated light from a floor lamp, while the baby was being nursed There were no convulsions and only occasional vomiting Constipation was noted from birth.

The patient was a well-nourished infant with obvious hydrocephalus (head circumference 15 inches, chest 11 inches) The child was irritable and had a shrill cry She moved her arms and legs jerkily She did not notice lights or objects before her eyes. The pupils were round regular and reacted briskly to light According to Dr Meyer Riwchun, ophthalmologist, there was primary optic atrophy particularly affecting the temporal halves of the nerve heads and a diffuse, low grade degenerative chorioretinitis most marked in the macular areas There was no reaction to loud noises Light touch brought out brisk startled reaction Moro s reflex was absent Tendon reflexes were hyperactive but equal and positive Babinski signs were present bilaterally

Blood and urine studies were negative X ray examination of the head revealed that the skull was wide in all diameters. The bones were thin and the fontanelles were widely open Electroencephalograms showed only the artefact of movement.

On September 10, 1947 subdural punctures revealed clear, colorless fluid bilaterally The needles were inserted to a depth of about 2½ inches, and clear fluid was found One cc of indigo carmine was then injected Lumbar punctures made at intervals of thirty minutes and two hours later failed to reveal any dye in the cerebrospinal fluid

Ventriculograms were attempted on September 13 1947 Eighty cc. of air were injected into what was thought to be both lateral ventricles X-ray study revealed large air-filled cavities but no evidence of a ventricular system was seen

On the same day the right and left subdural spaces were drained via bitemporoparietal burr holes Xanthochromic fluid drained copiously for two days. The anterior fontanelle remained retracted after the procedure.

On September 18 1947 right temporoparietal craniotomy was carried out. Immediately beneath the dura, we encountered a thin membrane thought to be the external membrane of a subdural hygroma Clear, slightly xanthochromic fluid was aspirated away, and the cavity present had to be inspected with the aid of a lighted retractor It was bounded medially by the entire falx cerebri covered by the thin membrane. No neopallium was seen on the right The membrane running downward beneath and perpendicular to the falx was opened and the same absence of neopallium was witnessed on the left The basilar structures consisted of large bulbous thalami apparently about 4 cm. in diameter A mass of choroid plexus was identified on the right side. After a sketch of the structures was made the exploration was terminated The bone and scalp flaps were closed in the conventional manner

The child expired on October 26 1948 Autopsy was obtained.

Summary and Conclusions

Three cases of schizencephaly with transient hydrocephalus have been reported In two cases

the diagnosis was completed by surgical exploration, while in one case air studies were sufficient

The diagnosis of schizencephaly is important for prognostication Although prognosis for longevity of life is hazardous, that for ultimate degree of function is certain The two living individuals are as undeveloped neurologically today is they were one year ago

Pediatricians cannot be expected to discover defects of the neopallium before that complex structure is known to exert its influence on the organism

References

1 Yakovlev Paul I and Wadsworth Richard C J Neuropath & Exper Neurol 5 116 169 (1946)
2 Cohn Robert and Neumann Meta A *ibid* 5 257 (1946)

CITES IMPORTANCE OF EARLY DIAGNOSIS IN STOMACH CANCER

The time has come to abandon the old attitude of hopelessness toward cancer of the stomach and esophagus, declares Richard H Sweet, M D , visiting surgeon at the Massachusetts General Hospital, Boston

Writing in the July 31 issue of the *Journal of the American Medical Association*, Dr Sweet says that "cancer of the stomach can be cured in an appreciable number of cases," provided that an early diagnosis is made and that the growth is of a reasonably favorable type

Attitudes toward cancer of the esophagus are also changing, he indicated Pointing out that until recently this type of cancer was considered quickly fatal in all cases, Dr Sweet reports that "an appreciable number" of patients with cancer of the esophagus now survive three years or more because of advances in surgery

"Earlier diagnosis, lower operative mortality, and a widening of the scope of the operation for cancer of the stomach have presumably cured a larger number of patients with stomach cancer in recent years"

Cancer of the stomach has long been regarded as a common disease Cancer of the esophagus is also a common disease from which about 27,000 persons die annually in the United States, according to Dr Sweet As an estimated 40,000 persons die each year in this country from cancer of the stomach, the two types cause nearly 21 per cent of the total deaths from cancer in the nation

Statistics have shown a one-sided picture which is unduly discouraging to patients with cancer of the stomach, Dr Sweet emphasizes Latest reports from various clinics show that 20 to 30 per cent of patients operated on for the disease are living five years after the operation, he says, explaining

"Statistical studies from various sources show that of all patients with proved cancer of the stomach, not over 5 per cent survive five years or more, and then only as a result of the application of surgery

"To be influenced by this apparently discouraging result, however, is to place emphasis on the wrong aspect of the problem The fact that, of all cases of cancer of the stomach in which a diagnosis has been made, in only 5 per cent a cure is effected, indicates that a large percentage of the cases are unsuitable for surgery when the patient is first seen or too far advanced for cure even though surgical excision is attempted There are innumerable statistics to prove this contention"

Massachusetts General Hospital statistics show six types of stomach cancer More than 90 per cent of patients operated on for the most favorable type were living five years or more after the operation

Of the second most favorable type, 75 per cent were living five years after operation, and of the third and fourth most favorable types, 40 per cent were living five years after operation

The most frequent type of stomach cancer, advises Dr Sweet, is the adenocarcinoma, the third most favorable.

The outcome of both cancer of the stomach and of the esophagus depends upon early diagnosis and immediate surgery, yet most cases of cancer of the esophagus are in a far advanced state by the time the patient is seen by the surgeon, and at least 25 per cent of cases of stomach cancer are unsuitable for operation because of the advanced stage of the disease

Cancer of the esophagus is a highly malignant type and progresses rapidly, warns Dr Sweet Therefore, it is extremely important that the patient consult a doctor at the first symptoms of such a disturbance. These are difficulty in swallowing and choking on food

Most persons are likely to do nothing about such symptoms except to chew food more carefully or to avoid eating foods which cause difficulty Only 22 per cent of the patients with cancer of the esophagus studied by Dr Sweet at the Massachusetts General Hospital entered the hospital in less than three months after symptoms were first noticed More than 35 per cent waited from three to six months and nearly 11 per cent waited more than 12 months

Every patient who complains of any disturbance associated with swallowing, whether it is with or without discomfort in the area of the esophagus, should be examined with x-rays, and many such patients should be examined with the esophagoscope

Onset of cancer of the stomach is often insidious and the early symptoms are often vague, he points out Only sometimes is pain felt, more obscure symptoms are discomfort, indigestion, or a bloated or full feeling after eating

Since the accuracy of x-ray films in diagnosing cancer of the stomach is not more than 90 per cent with even the most expert technicians, according to Dr Sweet, he recommends inspection of the interior of the stomach with a gastroscope or esophagoscope

Cancer should be suspected in every case of gastric ulcer which does not heal completely under treatment within a short time—one month at the most—Dr Sweet cautions

SPINAL EPIDURAL INFECTION

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IN 1941, there was presented from this clinic a review of 14 cases of pyogenic infection in the spinal epidural space.[1] Since then we have encountered 11 additional patients with this disease This communication is an analysis of the entire group of 25 patients Its purpose is to emphasize the characteristic features of pyogenic infection in this region and to ascertain the extent to which the use of sulfonamides and antibiotics has affected the results. We believe the syndrome requires re-emphasis because in our experience most patients with this disease are not referred to the neurosurgeon until the spinal cord has been considerably disturbed by the process. This delay seems to be due to the fact that the disease is not commonly recognized in its early stages. However, the catastrophic results attending delay (of even a few hours, in some cases) make early treatment imperative

Recognition of this syndrome is not difficult if the presence of such a pathologic process is considered a cause of the symptomatology Subsequent to or concomitant with an infection that is sometimes considered trivial or has long since been forgotten, there is a sudden onset of pain in the back and/or radicular pain, followed by evidence of altered spinal cord function In the absence of early treatment, the process advances rapidly to complete or almost complete functional interruption of the spinal cord. The syndrome may be considered in terms of three components pre-existing infection, pain in the back or radicular pain, and alterations in function of the spinal cord

A history of antecedent infection was elicited from 21 of the patients in this group In five the epidural infection was preceded by the appearance of furuncles on various parts of the body In five others it followed an acute infection of the respiratory tract Three patients had pendontal abscesses (associated in one with a furuncle on the side of the neck and in the other with an infection of the respiratory tract) In the remaining cases, antecedent infections included cystitis (with catheterization), pilonidal sinus (with instrumentation) uterine infection subsequent to abortion, and cellulitis of the finger, scalp and back. There was considerable variability in the interval between the initial infection and the onset of symptoms indicating vertebral or epidural infection This interval was one week or less in six cases two weeks in four cases, and one to three months in six cases. In the remainder, the period was even longer

In every instance, the examiner's attention was first drawn to the spine by the complaint of pain. Twenty two patients described pain in the back. In six of these, radicular pain appeared almost simultaneously, in six others it followed after a period which ranged from a few days to a few months. Radicular pain alone, as the first symptom of spinal or intraspinal disease, was uncommon occurring in only three of the 25 patients. The pain in the back was severe and either lancinating or boring It was increased by coughing straining, or motion. Symptoms referable to the spinal cord usually followed the onset of pain in a relatively short time This interval was one week or less in nine cases, one to two weeks in four cases, and two to three weeks in four cases The longest interval between pain and spinal cord symptoms was eleven months, the shortest was twelve hours The chronologic order in which symptoms referable to the spinal cord became apparent differed widely among the patients The most common initial symptom was weakness of the extremities below the level of the lesion but disturbance of spinal cord function was also indicated by numbness of the extremities and by urinary incontinence and retention. Regardless of the order in which they appeared, weakness, numbness, and urinary retention or incontinence followed each other in rapid succession. In eight cases, the progression of these symptoms from onset to the point of advanced alteration of spinal cord function occurred in two days or less On several occasions, it was observed that the pain in the back diminished or ceased with the establishment of numbness.

The abnormal physical findings were of two types local signs referable to the spine and neurologic manifestations of spinal cord dysfunction Four patients had redness and swelling of the skin about the vertebral column Thirteen had tenderness of one or more spinous processes Reluctance to alter the position of the back was evident in almost all Neurologic man-

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festations varied widely among the different patients Two patients had only hyperreflexia of the lower extremities and bilateral Babinski signs Eleven patients had evidence of moderately advanced spinal cord dysfunction, indicated by paresis of the extremities, tendon hyperreflexia, Babinski signs, and diminution of sensory perception below a definite level In seven patients, the interruption of the spinal cord was markedly advanced Below the level of the lesion, only isolated manifestations of spinal cord function were preserved, such as a tendon reflex, slight motion of the toes, or a small area in which sensation was perceived Five patients had apparently complete functional interruption of the spinal cord Below the level of the lesion, voluntional movements were absent, reflexes could not be obtained, and sensory perception was lost

The diagnosis was usually suspected because of the severe pain in the back, the rapid advance of neurologic disturbances, and the history of preexisting infection Auxiliary procedures were frequently of little value Fever and leukocytosis were absent in three patients In the remainder, the significance of these findings was obscured by the presence of associated inflammatory processes Roentgenograms of the spine were obtained in 16 cases, but this examination demonstrated osteomyelitis in only three of these Myelograms were obtained in seven cases, but in only five did this examination show obstruction of the subarachnoid space This procedure was not utilized more frequently because the location of the lesion was usually indicated with accuracy by tenderness of the spine and by the level of the sensory defect Furthermore, once the diagnosis was established with reasonable certainty, laminectomy was performed with a minimum of delay The Queckenstedt test was performed in 18 cases, and in 15 a partial or complete occlusion of the subarachnoid space was demonstrated The protein content of the cerebrospinal fluid was normal in one case and elevated in 12 (ranging from 52 to 1,180 mg per 100 cc) The cellular content of the cerebrospinal fluid was below 10 per cu mm in three cases and varied from 10 to 1,350 per cu mm in nine Culture of the cerebrospinal fluid from six patients yielded no growth in three, pneumococcus in one, and Staphylococcus aureus in two

Six patients were not subjected to operation Of these, three were moribund at the time they came under observation The presence of an epidural abscess was not recognized until postmortem examination was made in the other three (encountered early in our experience) Of the 19 patients upon whom laminectomy was carried out, six recovered, four were improved and ambulatory, two were improved but remained invalid, two were unimproved, and five died Among those who recovered, it was possible in each instance to relate the satisfactory result to some particular feature of the case Three patients had granulomas rather than abscesses, and the course of the disease was slow In the fourth, an abscess was drained when hyperreflexia and Babinski signs were the only evidence of spinal cord involvement In the fifth, operation was performed eighteen hours after the onset of neurologic symptoms In the sixth, the abscess was drained by spinal puncture on several occasions before operation Therefore, it would seem that a successful result is associated with drainage at an early stage or with a process that advances slowly

Pathologic changes associated with epidural infection were found in the extraspinal muscles, the vertebrae, and the intradural structures Three patients had paraspinal abscesses which seemed to communicate with the epidural space Osteomyelitis was found in 15 patients The gross alterations of the bone varied from softness and hyperemia to extensive destruction and sequestration The abscess in the bone was most often found in the vertebral arch (11 cases) but also occurred in the body (4 cases) Frequently, as the laminae were removed with a rongeur, a drop of pus would be expressed from the bone, but the exact spot from which it came was difficult to determine While the presence of bone involvement was sometimes obvious, its demonstration at other times required careful search, even at autopsy Osteomyelitic areas were observed at various levels from the fourth cervical to the third lumbar vertebrae, with a preponderance in the midthoracic region On six occasions, there was an infection of two or more adjacent vertebrae

The inflammatory processes in the epidural space assumed three forms presuppurative, suppurative, and granulomatous In the patient operated upon eighteen hours after the onset of neurologic symptoms, there was exposed an epidural mass of swollen, reddish, friable fat that was considered an inflammatory lesion that had not yet become suppurative Granulomas which varied in length from one to eight vertebral segments were found in six patients These were masses of granulation tissue which lay on the dorsal aspect of the dura mater and sometimes resembled an epidural neoplasm They were flat or semicylindric, with localized enlargements that tapered toward each end and merged with the epidural fat It was occasionally impossible to detect a line of demarcation between the granuloma and the dura mater, and the lesion sometimes appeared to be a gross thickening of the dura mater rather than a granuloma superimposed upon it Although the granulomas were not associated

with free pus, histologic examination often showed small abscesses within their substance

In 18 patients, there was found free pus The smaller abscesses lay in little pockets within the epidural fat, the surrounding fat being brownish, edematous, and granular In most instances, the pus extended along one to three vertebral segments. In contrast to the small collections of pus were the large abscesses exposed in two patients The purulent material extended for a distance of 16 vertebral segments in one and 19 in the other and seemed to be unencapsulated Under such conditions, it is apparent that an unsuspecting examiner could introduce infection into the subarachnoid space by performing lumbar puncture It is our present belief once the diagnosis of epidural abscess is seriously entertained that the information obtained by lumbar puncture hardly warrants the risk which attends the procedure Pus was found at various levels from the fourth cervical to the fifth lumbar vertebrae It has been stated that an epidural space exists only on the dorsal and dorsolateral aspects of the dura mater and that epidural abscesses are limited to this region [2] However we encountered two patients with collections of pus anterior to the dura mater In each, the abscess was associated with osteomyelitis of the body of the vertebra, and autopsy permitted verification of the fact that the pus lay between the posterior longitudinal ligament and the dura mater [3,4] Furthermore, Di Stasio has reported the case of a patient with an abscess lying in the anterolateral part of the epidural space [4]

Cultures were obtained from the epidural lesions of 19 patients. The responsible organism was Staphylococcus aureus in sixteen while a pneumococcus a gram-positive coccus and a gram-negative diplococcus, respectively were obtained from the other three

The dura mater in the region of epidural infection showed thickening and infiltration by leukocytes Neutrophils and lymphocytes were found in the subdural and subarachnoid spaces, with organization occurring in areas where the exudate was dense To a much lesser extent there was cellular infiltration of the pia mater Small blood vessels in the subarachnoid space and on the surface of the spinal cord showed varying degrees of thrombosis organization and recanalization. Within the spinal cord there were observed vacuolization of the white matter, destruction of myelin gliosis, and degenerative changes of the neurones. Similar alterations have been described by Hassin and Weilbaecher [5,6] We were unable to demonstrate any examples of suppurative myelitis, although Weil states that such may occur in association with vertebral osteomyelitis [7]

[*] Fig. 6, page 11.

Nine patients were examined postmortem The common findings were decubitus ulcers and infections of the urinary tract, with septic infarcts in the lungs kidneys, and spleen. Purulent meningitis was disclosed in five cases

Of the 19 patients on whom laminectomy was performed, 11 received penicillin and/or sulfonamides and eight did not. The over-all results in the two groups were not significantly different The comparison however does not afford a fair evaluation of the effect of these therapeutic agents, since in most instances their administration was begun after alterations in spinal cord function were well established

We have had additional experience with two patients (not included in the series) that indicates more clearly the probable beneficial effect of sulfonamides and antibiotics when administered early in the course of the disease One patient, subsequent to an infection of the respiratory tract, developed severe boring pain in the interscapular region This was accompanied by fever and leukocytosis On the next day, there appeared pain along the left costal margin Neurologic examination revealed absence of the left abdominal reflexes and the presence of Babinski signs bilaterally The Queckenstedt test demonstrated a patent subarachnoid space Intensive treatment with penicillin and sulfonamides was followed by recovery in ten days.

The second patient subsequent to an acute thrombophlebitis of a lower extremity associated with meningitis developed sudden stabbing pain in the back. Examination disclosed only tenderness of the fourth lumbar spinous process. Serial roentgenograms revealed a constant defect in the left lamina of the fourth lumbar vertebra Intensive treatment with penicillin was instituted The spontaneous pain disappeared in a few days, but the patient continued to have pain when attempts were made to change the position of the back, and coughing or laughing produced radiating pains in the posterolateral aspects of the thighs. After five weeks of treatment the patient's condition was considerably improved and roentgenograms showed only a small residuum of the lesion originally observed in the lamina. In both of these cases it was believed that osteomyelitis of the vertebra had been successfully treated with sulfonamides and penicillin before significant changes in the nervous system had become established

Kaplan and Read have reported a comparable case.[8] This concerned a patient who developed osteomyelitis of a cervical vertebra subsequent to furunculosis Neurologic examination disclosed only atrophy and paresis of the supra and infra spinatus muscles bilaterally The patient was

treated with penicillin and made an uneventful recovery in thirty-eight days

Discussion

Several features of this disease contribute to a concept of its pathogenesis The initial symptom was usually pain in the back, and this pain was persistent, boring, and considerably more severe than that which accompanies spinal cord tumor It resembled the pain that is characteristic of bone infections elsewhere in the body Furthermore, in every case the pain preceded the neurologic symptoms by days or months Consequently, we believe that epidural infection is usually preceded by osteomyelitis of the vertebrae This assumption is supported by the fact that epidural abscesses extending over many vertebral segments are frequently accompanied by osteomyelitis of only one vertebra It seems more reasonable to us to assume that the osteomyelitis preceded the abscess rather than to assume that an extensive abscess produced secondary infection of only one of the many adjacent vertebrae The production of changes in the spinal cord by epidural infection is probably due to several causes In view of the large size of some of the inflammatory processes in the epidural space, compression of the spinal cord must be considered as one factor However, the presence of a patent subarachnoid space in some patients and the relative infrequency with which distortion of the spinal cord can be demonstrated at autopsy suggest that compression is not the only factor Thrombosis of blood vessels in the subarachnoid space and on the surface of the spinal cord has been demonstrated to a degree that makes this pathologic process worthy of some consideration Finally, as suggested by Hassin, some significance must be attached to the stasis of tissue fluids in the spinal cord secondary to compression of the perineural spaces about the spinal roots [5]

Experience has amply demonstrated that the results of surgical drainage of an epidural abscess after the spinal cord is affected leave much to be desired On the basis of our experience, we believe that osteomyelitis of the vertebra can frequently be recognized in an early stage and that the prompt and adequate use of sulfonamides and penicillin may prevent the establishment of an extensive epidural infection Furthermore, we believe that the syndrome is so characteristic that its recognition depends only upon acquaintance with the symptomatology

Conclusions

1 Pyogenic infection in the spinal epidural space produces a syndrome that should be readily recognizable clinically

2 The pathologic findings strongly suggest that vertebral osteomyelitis precedes the establishment of infection in the tissues of the spinal epidural space

3 Clinical experience indicates that the use of penicillin and sulfonamides during the early stage of what is considered to be osteomyelitis of the vertebrae may inhibit extension into the epidural space

4 Evidence of implication of the spinal cord makes immediate drainage by laminectomy imperative

References

1 Browder J , and Meyers R Surgery 10 200 (Aug.) 1941
2 Dandy W Arch. Surg 13 477 (Oct) 1926
3 Browder, J and Meyers R Am. J Surg 37 4 (July) 1937
4 Di Stasio F Bull. School Med Univ Maryland 29 85 (Oct.) 1942
5 Hassin, G B Histopathology of the Peripheral and Central Nervous Systems 2nd ed., New York, Paul B Hoeber 1940 p 192
6 Weilbaecher J O New Orleans M & S J 92 208 (Oct) 1939
7 Weil A. Textbook of Neuropathology 2nd ed New York Grune & Stratton 1945 p 130
8 Kaplan L J and Read H S J M Soc New Jersey 44 54 (Feb) 1947

THE SANATORIUM AND LIFE

It is shortsighted to spend a great deal of time and money in developing an excellent medical program for the treatment of tuberculous patients without at the same time providing some form of supervised activity for patients with a favorable prognosis to enable them to bridge the gap between the sheltered life in a sanatorium and the life of the workaday world — *American Review of Tuberculosis, January, 1947*

NEW CHOLERA DRUG DEVELOPED

A new drug effective against cholera has been developed in the laboratories of Columbia University's College of Physicians and Surgeons Known as phthalylsulfacetimide, the drug was used on more than 500 patients in Egypt during a recent epidemic Mortality among 43 patients treated was only 2 per cent, as against 49 2 per cent among 20,781 untreated Experimental work was done by Doctors Harry Sobel and Edward Henderson

PRACTICAL ASPECTS OF CEREBRAL VASCULAR ACCIDENTS

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CEREBRAL vascular lesions are the most common causes of generalized or focal disturbances of the brain The patient with a cerebral vascular lesion is usually not seen by the physician until there has been a sudden and dramatic onset of neurologic symptoms. The physician is called to see a patient with a clinical picture which is commonly described by the term 'stroke' or "shock." Although there are differences in the mode of onset the symptomatology, and clinical course in the various types of cerebral vascular lesions the general picture may be quite similar, and it is often difficult to determine the nature of the lesion in any individual case from the clinical data The purpose of this article is to consider the common types of cerebral vascular lesions with particular regard to differential diagnosis and treatment The rare forms of cerebral vascular lesions associated with periarteritis nodosa, lupus erythematosus the blood dyscrasias, the encephalitides, and toxic states will not be discussed The common types of cerebral vascular lesions are cerebral thrombosis, intracerebral hemorrhage primary subarachnoid hemorrhage, and cerebral embolism

It is difficult to obtain accurate information regarding the relative frequency of the various types of cerebral vascular lesions Autopsy statistics are invalid because of differences in the mortality rate whereas figures based on clinical diagnosis are unreliable due to the difficulties in establishing an accurate diagnosis In a recent study (Table 1) cerebral hemorrhage constituted almost 50 per cent of 245 autopsy-controlled cases, whereas they represented only 21 per cent of the 604 cases in which the diagnosis was based on the clinical findings [1] Cerebral thrombosis was found in 43 per cent of the necropsy-controlled cases and was estimated to constitute 66 per cent of the cases diagnosed on basis of the clinical findings The diagnosis of cerebral embolism was made in 5 per cent and primary subarachnoid hemorrhage in 8 per cent of the 604 clinically controlled cases.

Although all types of cerebral vascular lesions may occur at any age (Table 2) intracerebral hemorrhage and cerebral thrombosis are uncommon before the age of forty The peak incidence of cerebral thrombosis is in the sixth to eighth decades as compared with the fifth to eighth decades for cerebral hemorrhage The incidence of cerebral embolism and primary subarachnoid hemorrhage is more evenly spread over the various decades with the greatest incidence in the fifth to seventh decades [2]

Symptoms

Premonitory Symptoms.—Premonitory symptoms of an impending cerebral vascular accident are infrequent When they occur they may be nonspecific or focal in nature. Nonspecific symptoms include headache, dizziness, drowsiness, and mental confusion One or more of *these symptoms is not infrequent in patients* with cerebral vascular disease, and their occurrence does not necessarily presage an impending "stroke"

Focal premonitory symptoms are uncommon and when present usually presage the onset of a thrombosis rather than a hemorrhage A transient loss of speech, hemiplegia or paresthesias in one half of the body may precede the onset of a severe paralysis by a few hours or days These *fleeting symptoms have been explained on basis*

TABLE 1.—The Incidence of the Various Forms of Cerebral Vascular Lesions

	Necropsy Controlled Cases		Clinically Controlled Cases*	
	Number	Per Cent	Number	Per cent
Cerebral hemorrhage	116	47	127	21
Cerebral thrombosis	106	43	398	66
Cerebral embolus	23	10	32	5
Primary subarachnoid hemorrhage			47	8
	245	100	604	100

* Diagnosis made on basis of clinical data alone

TABLE 2.—The Age Incidence (in Percentages) of Cerebral Vascular Lesions in Autopsy Proved Cases

Age in Years	Intracerebral Hemorrhage[1]	Thrombosis	Embolism[1]	Primary Subarachnoid Hemorrhage[1]
Less than 20	1	0	0	11
20 to 29	0	0	9	17
30 to 39	3	1	14	19
40 to 49	21	7	14	20
50 to 59	27	24	9	18
60 to 69	26	36	22	10
70 to 79	20	25	0	4
Over 80	2	7	6	1
Total	100	100	100	100

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of spasm of the vessel They could, however, be due to thrombosis of small terminal twigs of the parent trunk. Paralysis of one of the cranial nerves as the result of compression by an aneurysm may be present for several weeks or months before rupture of the aneurysmal sac

Symptoms at Onset of "Stroke"—In the vast majority of the cases the symptoms of a cerebral vascular accident are of sudden onset and reach the maximum intensity within a few minutes or a few hours at the most These symptoms may again be divided into two groups, focal and generalized The focal neurologic symptoms, such as paralyses, sensory loss, and speech defects, are related to the site of the hemorrhage or infarct These will not be discussed in detail since they are of only secondary importance in regard to the differential diagnosis

The generalized symptoms include headache, vomiting, convulsions, and coma These symptoms may occur in any type of cerebral vascular accident, but they are more common in patients with an intracerebral or subarachnoid hemorrhage

Coma, the most dramatic initial symptom of cerebral vascular accident, occurs at the onset in 51 per cent of the patients with a cerebral hemorrhage, in 33 per cent of cerebral thromboses, in 25 per cent of the patients with a cerebral embolus, and in 30 per cent of the patients with a primary subarachnoid hemorrhage

Convulsions, usually generalized but occasionally jacksonian in character, occur at the onset or within a few hours in 15 per cent of the patients with cerebral hemorrhage, in 7 per cent of cerebral thrombosis, in 9 per cent of the patients with a cerebral embolism and in 15 per cent of subarachnoid hemorrhage

Vomiting is present at the onset in about 50 per cent of the noncomatose patients with a cerebral or subarachnoid hemorrhage, in 25 per cent of the cerebral emboli, and in only 16 per cent of cerebral thromboses

Headache as an initial symptom occurs in approximately 63 per cent of the noncomatose patients with a cerebral hemorrhage, 25 per cent of cerebral emboli, in 6 per cent of the cerebral thromboses, and in almost 100 per cent of the patients with a primary subarachnoid hemorrhage

Signs

If the hemorrhage is a small one or if a minor vessel is occluded by a thrombus or embolus, there may be no change in the vital signs With a large hemorrhage or occlusion of a major vessel, the temperature is elevated, the pulse rate is increased, and the rate and depth of the respirations are altered Failure of the vasomotor and heat-regulating centers is a constant finding in patients with any type of fatal cerebral vascular accident There is a uniform rise of temperature, pulse rate, and respiratory rate several hours or days before death occurs

Since arteriosclerosis and hypertension are the most frequent causes of both intracerebral hemorrhage and thrombosis, evidence of sclerosis of the peripheral and retinal vessels abnormalities in the heart, and changes in the blood pressure are common findings Clinical signs of cardiac enlargement or auricular fibrillation are present in over 90 per cent of the patients with a cerebral embolus Cardiac enlargement is present in approximately two thirds of the patients with a cerebral hemorrhage or thrombosis, but auricular fibrillation is relatively rare Arteriosclerosis and hypertension are common findings in the patients with a primary subarachnoid hemorrhage after the age of forty

The blood pressure is within normal limits in the majority of patients with a cerebral embolus, but it is usually elevated in patients with a cerebral hemorrhage, subarachnoid hemorrhage, or thrombosis However, these lesions may occur in a patient with a normal blood pressure (Table 3)

Pupillary findings in cases of cerebral vascular lesions are quite variable, depending on the time the examination is made and the presence of other complicating factors, such as syphilis and changes in the pupillary reactions associated with old age Inequalities in the size of the pupil are common, and the larger pupil is usually on the side opposite to the cerebral lesion The reaction of the pupils to light is lost or greatly impaired in over 25 per cent of the patients with a cerebral hemorrhage and in less than 10 per cent of the cerebral thromboses Conjugate deviation of eyes alone or the head and eyes together is frequently present in the patients with evidence of a severe cerebral lesion It is more common following an intracerebral hemorrhage than after other types of lesions The deviation is almost always toward the side of the lesion and is associated with impairment of the movements of

TABLE 3.—THE SYSTOLIC BLOOD PRESSURE IN AUTOPSY PROVED CASES OF CEREBRAL VASCULAR LESIONS (IN PERCENTAGES)

Blood Pressure (Systolic)	Hemorrhage (107 cases)	Thrombosis (96 Cases)	Embolism (19 Cases)	Subarachnoid Hemorrhage (30 Cases)*
80–99	1	0	16	0
100–139	10	11	32	30
140–159	10	18	32	13
160–199	39	45	15	20
Over 200	40	26	5	37
	100	100	100	100

* Not autopsy controlled.

the head and eyes to the opposite direction The deviation of the head and eyes tends to disappear with improvement in the general condition of the patient

Stiffness of the neck is an almost constant finding in patients with an intracerebral or primary subarachnoid hemorrhage and is related to the presence of blood in the cerebrospinal fluid It is rarely present in patients with a cerebral thrombosis or embolus.

Mental symptoms and signs—confusion, disorientation, and impairment of memory—are frequently present in the period immediately following a cerebral vascular accident These are related in part to the generalized focal disturbance of cerebral function associated with the vascular lesion and in part to cerebral arteriosclerosis

The presence of signs of focal brain damage hemiplegia aphasia hemianopia, and the like is related to the site of the lesion Changes in the tendon reflexes and the plantar responses can usually be explained on the basis of the focal lesion All of the tendon reflexes may be lost when the patient is in the comatose state immediately following the onset of the vascular lesion but it is more common for the reflexes to be hyperactive on the side opposite to the focal cerebral lesion The plantar response is extensor (Babinski s sign) in type in 25 per cent of the patients with blood in the cerebrospinal fluid and in approximately 15 per cent of the patients with a cerebral thrombosis or embolus in the period immediately after the onset of the lesion

Laboratory Data

Albumin and casts are found in the urine in a high percentage of the patients, regardless of the type of the vascular lesion This is usually due to associated renal disease and may be accompanied by an elevation of the serum nonprotein nitrogen content. Transient hyperglycemia and glycosuria in the absence of diabetes mellitus is not infrequent. It is probably due to a temporary disturbance in the sugar metabolism as a result of the cerebral injury It cannot be correlated with the site of the lesion but it is noted more frequently in patients with a hemorrhage than in those with thrombosis or embolism. A leukocytosis of 12,000 or over is present in over 50 per cent of the patients with a cerebral or subarachnoid hemorrhage and in approximately 10 per cent of the patients with a cerebral thrombosis. A white blood count greater than 20 000 is diagnostic of a hemorrhage unless there is a concomitant infection

The cerebrospinal fluid pressure is usually normal in patients with a cerebral embolus or thrombosis Pressures between 200 and 300 mm. are present in a small percentage of the cases, but readings greater than 300 are rarely seen. In contrast, the pressure is greater than 200 mm in the majority of the patients with an intracerebral or primary subarachnoid hemorrhage.

The cerebrospinal fluid is bloody in all of the patients with a primary subarachnoid hemorrhage, in 75 per cent of the cases of cerebral hemorrhage, and in 15 per cent of the cases with cerebral embolism. It is clear in cerebral thrombosis, although there may be a slight xanthochromic tinge with a few red blood cells on microscopic examination

The Wassermann or other specific tests for syphilis are negative in the clear cerebrospinal fluids unless syphilis of the central nervous system is present. The presence of a positive reaction in a bloody fluid cannot be accepted as evidence of syphilis of the nervous system since it may be due to the presence of syphilitic reagin in the blood serum present in the fluid The test should be repeated after an interval sufficient for the cerebrospinal fluid to become clear has elapsed

Clinical Course

The course of patients with cerebral vascular lesions depends on the type and extent of the lesion and the presence or absence of other complicating factors The prognosis for life is grave if there has been a hemorrhage of any appreciable size or if a major vessel is occluded by a thrombus or embolus When a small vessel is the site of a thrombus or an embolus the patient is usually able to survive the insult unless the complicating factors are serious enough to cause death.

In the fatal cases the duration of life after the onset varies from a few hours to two months Cerebral vascular accidents, except as noted below are not a cause of sudden death (within minutes) Death may occur within a few minutes when a large aneurysm ruptures into the subarachnoid space and death within twelve hours is most common in this type of cerebral vascular accident (Table 4) Death occurs within three to twelve hours in a few cases of cerebral hemorrhage, but as a rule it is delayed for a period varying from one to fourteen days. Occasionally a patient with a cerebral hemorrhage may live several months and die as a result of the hemorrhage Death within twenty four hours is rare in patients with a cerebral thrombosis or embolus Death in these cases most commonly occurs several days to several weeks after the onset, but it may occur several months later as the result of complications.

The vascular accident is the chief or sole cause of death in the various types of cerebral vascular accidents as follows intracerebral hemorrhage

TABLE 4.—Length of Survival in 243 Cases of Fatal Cerebral Vascular Lesions (in Percentages)

Length of Life After Onset	Hemorrhage (115 Cases)	Thrombosis (89 Cases)	Embolism (21 Cases)	Primary Subarachnoid Hemorrhage (18 Cases)
Less than 12 hours	4	0	0	22
12 to 24 hours	3	1	0	11
1 to 4 days	41	30	38	28
5 to 14 days	39	39	38	11
2 weeks to 2 months	12	23	19	22
2 months to 6 months	1	7	5	6
	100	100	100	100

40 per cent, primary subarachnoid hemorrhage (first attack) 35 per cent, cerebral thrombosis 25 per cent, and cerebral embolus 30 per cent The common contributory causes of death in patients with an intracerebral hemorrhage, primary subarachnoid hemorrhage, or cerebral thrombosis are bronchopneumonia, cardiac failure, uremia, lobar pneumonia, diabetes mellitus, and pulmonary infarct Additional contributory causes of death in patients with cerebral embolus include vegetative endocarditis and embolic phenomena in other parts of the body

As a rule, the general symptoms are also most intense immediately after the onset, but occasionally in the fatal cases there may be an increase in the depth of coma or a lapse into coma several hours after the onset

The focal neurologic symptoms are most severe immediately following the onset of the cerebral vascular accident There are a few exceptions to this rule In a small percentage of the cases of cerebral hemorrhage there may be an increase in the severity or extent of focal neurologic symptoms over a matter of a few hours This progress in neurologic signs can be explained by an increase in the size of the hemorrhage Progression of focal neurologic signs is rare in patients with a cerebral thrombosis or embolism Progression in such cases can be explained by an independent involvement of other vessels or by the propagation of the thrombus to the point of origin of another branch of the thrombosed vessel

The prognosis for return of function of paralyzed members cannot be predicted with any degree of certainty in the first few days or weeks In the nonfatal cases there is usually some improvement in the focal neurologic signs In some cases this improvement may be very dramatic with complete resolution of all signs within a few hours or a few days The hypothesis of a cerebral vascular spasm is used by some authors to explain the fleeting nature of the symptoms in such cases More commonly, the improvement of symptoms takes place slowly, with improvement for a matter of several months Usually, the patient is left with some permanent residual symptom, such as stiffness and difficulty in the use of the leg in walking, awkwardness in the use of the hand, or some degree of speech defect In the occasional case there will be no improvement for several weeks but a gradual and appreciable improvement in the following months For this reason, treatment of the neurologic defect should not be given up as hopeless until at least six months have elapsed

Differential Diagnosis

The differential diagnosis in patients suspected of having a cerebral vascular accident is twofold First, they must be differentiated from other lesions of the nervous system, second, an attempt should be made to determine which form of cerebral vascular accident is present

The differential diagnosis from other lesions of the nervous system is usually not difficult when the complete history of the patient's illness is known, but it is often extremely difficult when the patient is found in a comatose state and there is no adequate history in regard to the onset of the coma In such cases a careful examination of the patient and the judicious use of certain laboratory tests are necessary The laboratory procedures of greatest value are the examination of the urine the determination of the nonprotein nitrogen and sugar content of the blood, and examination of the cerebrospinal fluid

The patient's head should be examined carefully for evidence of external injury, and the size and reactions of the pupils and the odor of the breath should be noted The optic disks should be examined The character of the respirations, the temperature, pulse rate, and blood pressure are important The presence or absence of stiffness of the neck should be noted

It is of paramount importance to determine whether a *hemiplegia* is present This is not simple in a comatose patient but can usually be done The face should be carefully observed, and if there is a puffing out of one cheek with each expiration, there is a paralysis of that side of the face Paralysis of the extremities can be determined by lifting each extremity and allowing it to fall If the coma is not too deep, the paralyzed limb will fall heavily, while the unparalyzed limb will gradually sink to the bed When the patient is in deep coma, all limbs may fall heavily to the bed Vigorous stimulation of the soles of the feet by a blunt stick or key will cause a withdrawal of the unparalyzed limb, while the paralyzed limb will remain inert

A hemiplegia of sudden onset together with a marked degree of hypertension is presumptive evidence of a cerebral vascular lesion The diagnosis of uremia or an expanding lesion in the

cerebrum, such as brain tumor, brain abscess and subdural hemorrhage, cannot definitely be excluded, however If there is no hemiplegia and the blood pressure is normal, coma due to diabetes, acute alcoholism, extradural or subdural hemorrhage or drug poisoning must be considered

The odor of acetone on the breath and the presence of sugar in the urine (which may have to be obtained by catheterization) are in favor of diabetes It must be remembered, however, that a transient glycosuria and hyperglycemia occur in a definite percentage of the cases of cerebral hemorrhage or thrombosis. The determination of the sugar content in the blood will aid in establishing or excluding the diagnosis of diabetic coma, since the rise in blood sugar which occurs with cerebral vascular accidents is rarely as high as that commonly seen in diabetic coma

The presence of albumin and casts in the urine are in favor of uremia, but the diagnosis cannot be definitely established without a determination of the nonprotein nitrogen content of the blood It must also be remembered that cerebral vascular lesions are a common complication of uremia

An alcoholic odor to the breath, a normal blood pressure, no evidence of a hemiplegia, and a normal cerebrospinal fluid are the characteristic findings in cases of coma due to acute alcoholism The cerebrospinal fluid pressure in these cases may be slightly elevated (200 to 300 mm)

Cases of extradural hemorrhage are usually easy to differentiate from cases of cerebral vascular lesions The differential is important since the treatment is immediate operation with removal of the clot and ligation of the middle meningeal artery The presence of contusions or lacerations of the scalp indicative of a head injury is important It must be remembered, however, that a patient with a cerebral hemorrhage or thrombosis may fall and injure his head X-rays of the skull and an examination of the cerebrospinal fluid is often of aid The typical sequence of events in patients with an extradural hemorrhage resulting from trauma is as follows an immediate period of coma from which the patient recovers a lucid interval of several hours duration which is followed by a gradually increasing stupor and the development of a hemiplegia This classic history is present in only about one half of the cases, because there may be sufficient trauma to the brain to produce a prolonged coma which merges with the coma resulting from the pressure of the extradural clot If there is a fracture of the skull which passes through the groove of the middle meningeal artery the diagnosis of extradural hemorrhage should be made

The diagnosis of subdural hemorrhage is often difficult It is important that the diagnosis be made promptly because immediate operation is necessary to save the patient's life The differential diagnosis is further complicated by the fact that the head injury which produced the subdural hemorrhage may have been only a slight or moderate one and an interval of several days or weeks may separate it from the symptoms produced by the hematoma In addition, the coincidence of hypertension and subdural hematoma is frequent. If there is a history of a recent head injury and there are fluctuations in the patient's state of consciousness, the diagnosis of subdural hematoma should be considered The frequent association of subdural hematoma with chronic alcoholism should be kept in mind X-ray examination and examination of the cerebrospinal fluid is of value in the differential diagnosis The presence of a fracture of the skull or displacement of a calcified pineal gland are in favor of the diagnosis of a subdural hematoma The finding of a bloody or xanthochromic cerebrospinal fluid under increased pressure excludes the diagnosis of cerebral thrombosis but does not differentiate between subdural hematoma and intracerebral or primary subarachnoid hemorrhage. Whenever the diagnosis of subdural hematoma cannot be excluded by the history and the findings on examination small trephine openings should be made in the temporal region of the skull on *both* sides. It is not uncommon to have false localizing signs in subdural hematomas, and in addition, it is not rare to find a clot in both the subdural spaces

In cases of brain tumor or brain abscess the onset of the hemiplegia is usually gradual and preceded by a history of headaches vomiting, or convulsions for several months. The presence of 'choked disks ' a normal blood pressure, an increased cerebrospinal fluid pressure, and a clear or slightly yellow cerebrospinal fluid with a normal cell count and an increased protein content are the characteristic findings in cases of brain tumor Exactly similar findings are present in cases of brain abscess except that the cerebrospinal fluid usually shows a mild or moderate pleocytosis

The history of numerous previous convulsions and the occurrence of a convulsion before the onset of the coma together with a normal blood pressure and a normal cerebrospinal fluid are in favor of the diagnosis of epilepsy

The differential diagnosis between the various types of cerebral vascular lesions is important chiefly in regard to the prognosis as to recovery from the "shock and as to the degree of recovery from the focal neurologic signs. The diagnosis of the cerebral hemorrhage or primary subarachnoid hemorrhage carries with it a grave import as to the life of the patient and the chance of

complete recovery from any paralysis that may be present

The diagnosis of cerebral embolism is indicated whenever there is a sudden onset of neurologic symptoms in a patient with an acute or chronic endocarditis, auricular fibrillation, a recent coronary thrombosis, septicemia, or a septic focus These cases often present clinical evidence of embolic phenomena elsewhere in the body

Primary subarachnoid hemorrhage must be differentiated from intracerebral hemorrhage [3 4] Headache is a prominent symptom, and signs of meningeal irritation, stiffness of the neck and Kernig's sign develop rapidly, but focal neurologic signs, such as hemiplegia or aphasia, occur in less than 20 per cent of the cases The presence of a bloody spinal fluid and a hemiplegia indicates that there has been an intracerebral hemorrhage and is against the diagnosis of a primary subarachnoid hemorrhage It must be remembered, however, that an aneurysm may be so located that it bleeds into both the subarachnoid space and the cerebrum when it ruptures Paralysis of the third or other cranial nerves is in favor of the diagnosis of primary subarachnoid hemorrhage

The differential diagnosis between cerebral hemorrhage and thrombosis is difficult since focal neurologic signs are similar in both and since both occur in patients of the same age group and in patients with arteriosclerosis and hypertension A freshly bloody cerebrospinal fluid is diagnostic of a cerebral hemorrhage In the absence of blood in the cerebrospinal fluid or if a lumbar puncture is not performed, there are several points in the history and physical examination that will make it possible to make this differential in the majority of the cases The presence of the signs and symptoms listed below are in favor of the diagnosis of an intracerebral hemorrhage (1) convulsions at the onset, (2) the occurrence of severe headache, nausea, or vomiting at the onset, (3) Cheyne-Stokes or labored respirations and conjugate deviation of the eyes, and (4) stiffness of the neck, quadriplegia, and bilateral Babinski toe sign

Treatment

The treatment of patients with cerebral vascular accidents is separated into two parts first, the treatment in the immediate period after onset, which is mainly devoted toward saving the life of the patient, and second, the treatment of residual defects

In the first stage, skillful nursing care is essential The patient should be kept in a quiet room Fluids and liquid nourishment should be given by mouth if the patient is conscious If the patient cannot swallow, glucose solution (5 per cent) should be given subpectorally or into the thighs The bladder should be emptied by catheterization if necessary and the bowels kept open by enemas or cathartics The position of the patient in bed should be changed frequently to prevent the development of hypostatic pneumonia or bed sores The bed sheets should be changed immediately when they are soiled by urine or feces Sedatives should be used with care and the opiates avoided, since they tend to depress the respiratory centers

There is no very satisfactory medical treatment for the cerebral lesion Gilbert and de Takats recommend blocking the cervical sympathetic trunk with procaine on the side of the lesion in an effort to relieve the collateral stasis, vasoparalysis, and edema which accompanies the vascular insult [5] The increased intracranial pressure which often accompanies an intracerebral or subarachnoid hemorrhage can be treated by removal of fluid by lumbar puncture or by the administration of hypertonic solutions by vein or by rectum Care should be taken not to dehydrate the patient excessively

The chief danger in patients with cerebral hemorrhage is death from collapse of the vital centers, which is almost certain to occur if the bleeding continues There is no known method of hastening the cessation of the hemorrhage from a ruptured vessel Venesection, which was formerly recommended, is of no value unless it is used to combat polycythemia or congestive heart failure Special treatment, such as transfusions or the administration of vitamin K, is of little value unless the bleeding is related to systemic diseases such as purpura

The therapeutic value of lumbar puncture in patients with an intracerebral hemorrhage is unproved It is unlikely that the removal of cerebrospinal fluid will increase the bleeding, and it may be of considerable value in relieving the increased intracranial pressure, especially when a large amount of blood has been extravasated into the subarachnoid space If, however, the mass of the clot is confined to the substance of the cerebrum, the removal of cerebrospinal fluid is not effective in reducing the intracranial pressure Lumbar puncture can be performed as a diagnostic measure, and it may be repeated at intervals of twelve to twenty-four hours if large amounts of bloody fluid can be removed

Since cerebral hemorrhage usually results in death and since the clot is slowly absorbed and is apt to behave like a tumor, the question of operative removal of the clot should be considered in all patients who survive the initial shock of the hemorrhage [6] Such operations have proved of life-saving value in a number of cases and are of benefit in decreasing the severity of the neuro-

logic defect Unfortunately the extremely poor general condition of the patient is a deterrent to a widespread use of this form of treatment At the present time, operative removal of the clot is most suitable in those patients who have survived the initial shock of the hemorrhage and who continue to show evidence of increased intracranial pressure

There is some disagreement as to the value of lumbar puncture in the treatment of patients with a primary subarachnoid hemorrhage Experience has shown however that improvement in the clinical state of the patients follows the removal of cerebrospinal fluid and the reduction of cerebrospinal fluid pressures. Punctures should be repeated as frequently as required to keep the cerebrospinal fluid pressure at normal level

Since recurrence of the bleeding is apt to occur in patients with a primary subarachnoid hemorrhage, consideration should be given to measures directed at localizing and treating the aneurysm If the site of the aneurysm is not evident from the clinical signs it must be localized by cerebral angiography [7] In general there are two methods of relieving pressure on the aneurysmal sac The first and least serious method is ligation of the internal carotid artery on the side of the aneurysm. The second is exposure of the aneurysm by craniotomy and ligating the vessel on both sides of the sac (trapping) [8] Ligation of the internal carotid artery should not be performed until it has been shown that occlusion of the carotid artery by manual compression for periods as long as thirty minutes can be tolerated by the patient without the development of symptoms. Even with this assurance of competency of the collateral circulation ligation of the internal carotid artery may be followed by the development of a contralateral hemiplegia Ligation of the aneurysm at craniotomy is a major surgical procedure and is accompanied by a high mortality rate. The decision regarding the applicability of either type of operation is a delicate one and although no set rule can be established it would seem wise to defer operation until there is evidence of one recurrence of the bleeding

After the patient has recovered from the 'shock' of the cerebral vascular accident the therapy should be directed toward restoration of function in the paralyzed limbs Light massage of the muscles and passive movements of the affected limbs are useful in maintaining the proper circulation and nutrition of the paralyzed muscles and help to prevent the development of arthritic changes in the joints It is of great importance to encourage the patient to try to use the paralyzed muscles The first voluntary movements should be aided by simultaneous passive movements of the joints Systematic passive movements of all the joints of the affected arm and leg should be made for a few minutes several times a day The patient should be encouraged to try to move the joints while the physiotherapist is doing so These exercises should not be unduly prolonged as the patient will tire and become discouraged The patient should be given a soft rubber ball to hold in his hand and instructed to exercise the fingers by squeezing the ball and by placing it on the bed or table and picking it up With return of function more skillful actions should be tried If there is any tendency toward the development of contracture in the extremities, well padded removable splints should be applied. These splints need be kept on only a portion of each day

When the patient has regained sufficient strength and his general condition permits he should be allowed up in a chair for a few minutes This interval can be increased daily as the condition of the patient warrants Attempts at walking should be aided at first by allowing the patient to lean on an attendant's shoulder A cane should be substituted as soon as practicable and thus discarded only when the strength of the trunk and leg muscles is sufficient to support the patient

The treatment of aphasia or disorders of speech is difficult and requires infinite patience on the part of the physician and persistent effort on the part of the patient Best results are obtained when re-education exercises are given by a trained speech therapist Fortunately in the majority of the cases the lesion is not centered in the speech areas and complete or nearly complete return of the power of speech may occur

In the cases of cerebral thrombosis due to or associated with a syphilitic infection of the cerebral vessels antisyphilitic therapy (penicillin) should be given.

Discussion

Paul H Garvey, M.D, *Rochester* —The subject which Dr Merritt has so ably discussed this morning is one which covers a large group of cases often neglected even in our modern hospitals Too frequently these cases are dismissed by the physician who classifies them indiscriminately as cerebral vascular accident with no attempt to visualize the cerebral pathology which in most cases brings about a sudden and dramatic change from a state of normal health to one of unconsciousness and paralysis. Even head trauma, tumors, and many other organic diseases if not too obvious are very often included in this general category

The figures presented concerning the incidence of various forms of cerebral vascular lesions are particularly informative because they represent a large series of cases based on clinical and pathologic

findings I am sorry that I did not have sufficient time to review the material at the Strong Memorial and Rochester Municipal Hospitals from the statistical standpoint However, I did discuss the percentages reported by Dr Merritt with one of our pathologists whose reaction was that the figures, if compiled, would probably correspond very closely with those quoted here this morning While the incidence of intracerebral hemorrhage can be accurately determined at the autopsy table, I do not believe that the same holds true in cases of cerebral thrombosis The terms, encephalomalacia and cerebral thrombosis, are often used interchangeably by the pathologist However, in the routine autopsy practically no attempt is made to demonstrate the thrombosed vessel except in those cases where a major vessel is involved Similarly, the source of primary subarachnoid hemorrhage is often overlooked, because no careful search is made for minute aneurysms involving the vessels at the base of the brain However, in those cases where the blood is concentrated principally over the convexity of the brain, a search, regardless of how thorough, is usually fruitless

Dr Merritt has emphasized the difficulties encountered in differentiating cerebral thrombosis from the various types of intracranial hemorrhage Obviously, the age incidence and blood pressure levels are not very helpful in making the differential diagnosis, but it is worthy of note that hemorrhage has a tendency to occur at a slightly earlier age and it is true also that this diagnosis should be favored when the blood pressure reaches an excessively high level It is my opinion that the most important diagnostic aid in the differentiation between a cerebral thrombosis and cerebral hemorrhage is the lumbar puncture carefully performed This procedure should be done routinely in all hospital cases and also in the home where one is confronted with a case of suspected cerebrovascular accident In the last analysis, this is the only certain criterion by which intracranial bleeding can be determined The initial pressure of the spinal fluid, as a rule, is not greatly increased in cases of cerebral thrombosis, but definite elevation is to be expected in cases of intracranial bleeding, whether the bleeding is located in the brain or whether it is one of the various types of meningeal bleeding mentioned in the author's differential diagnosis

While speaking of the value of a lumbar puncture in cases of suspected cerebral vascular accident, a word of caution concerning the Queckenstedt test in the type of case under discussion might be in order Many physicians, house officers, and students consider that a lumbar puncture without this procedure is incomplete I believe they fail to recognize the important fact that the chief value of jugular compression is to determine the presence or absence of spinal subarachnoid block and has relatively little value in the diagnosis of intracranial conditions I feel, therefore, that the Queckenstedt test is not only inadvisable but contraindicated in cases of suspected intracranial hemorrhage, intracranial tumor, or abscess

In Table 4 of his paper, Dr Merritt has listed the period of survival in 243 cases of fatal cerebrovascular lesions of which 87 per cent of 115 cases of hemorrhage died within a period of two weeks and 70 per cent of 89 cases of cerebral thrombosis were dead within the same period of time It should be borne in mind that all of the cases listed in Table 4 are fatal cases Returning to Table 1, it might be well to point out again that the number of clinically controlled cases totals 604, compared to 245 necropsy controlled cases In other words, cerebrovascular accident does not necessarily carry with it a fatal outcome We are all acquainted with the type of hemiplegic patient encountered in homes and hospitals for chronic disease in whom paralysis has existed for five or ten years and even longer In addition to these two contrasting groups are the very fleeting hemiplegias which occur in hypertensive individuals and in those patients who apparently have a cerebral thrombosis with almost complete recovery of function Therefore, the accuracy of the diagnosis in the case of cerebral lesion is extremely important in order to arrive at a reasonable prediction concerning the outcome and management

With the basic principles of treatment as you heard them outlined this morning, I am in complete agreement It would seem to me that for patients with cerebral arteriosclerosis and hypertension where a vascular lesion has already occurred, there is very little that can be done to reverse the situation other than to apply the general measures which have been set forth On the other hand, in those cases where there is the remotest possibility of a subdural hemorrhage, I thoroughly agree with the author that bilateral bur holes should be made Then there is the problem of primary subarachnoid hemorrhage in the relatively young individual, this situation makes decision difficult and demands careful consideration relative to the proper procedure to be followed The clinical syndrome produced by aneurysms involving the anterior portion of the circle of Willis has been quite clearly established Everyone recognizes the seriousness of this problem and is well aware that it presents a picture wherein death may follow an intracranial hemorrhage by a few minutes Whether or not a direct surgical attack of these aneurysms is the solution remains to be determined In Rochester a small group of cases has been observed in which operation was performed and the aneurysm trapped, as Dr Merritt terms it Thus far, these patients have done fairly well, although the period of observation has been relatively short On the other hand, I can recall several patients living useful lives today who have had one or more attacks of subarachnoid hemorrhage over a period covering approximately sixteen years

References

1 Aring C D and Merritt H Houston Arch Int Med 56 435 (1935)
2 McDonald, C A and Korb M Arch. Neurol & Psychiat 42 298 (1939)
3 Hamby W B J A M A 136 522 (1948)
4 Richardson J C and Hyland H H Medicine 20 1 (1941)
5 Gilbert N C and de Takats G J A M A 136 659 (1948)
6 Penfield W Canad M A J 28 369 (1933)
7 Wechsler I S and Gross S W J.A M A 136 517 (1948)
8 Dandy W E Ann Surg 107 654 (1938)

THE FUNCTION OF A CHILD GUIDANCE CLINIC IN A CHILDREN S HOSPITAL

SHERMAN LITTLE, M D Buffalo, New York
(From the Children s Hospital)

MOST of you are undoubtedly aware of the way in which the usual child guidance clinic functions. It is an independent agency set up with community chest funds and is usually more related to social agencies than to hospitals or other medical institutions The staff consists of the coordinated team of psychiatrist psychologist, and social worker Their function is the treatment of the emotional disturbances, usually called "behavior problems " of the children who are brought to them They also render diagnostic service where this is needed, but diagnosis is not a clinic's major function Well trained physicians, teachers, psychologists, and social workers in the community should be able to make an adequate diagnosis on most cases as to whether psychiatric treatment is indicated, thus saving the time of the clinic staff for the specialized work of treatment. As I am sure you are aware, this consists of working individually with both parent and child to the end that emotional difficulties which have interfered with a healthy parent-child relationship are straightened out Emotional and psychologic growth can then proceed along the road to a healthy maturity

The need for more treatment facilities is and for a long time to come will continue to be a very pressing problem. Important as treatment is and great as is the need to my mind it is secondary to even greater needs in the field of prevention—adequate methods, programs and facilities Just as the major emphasis in tuberculosis was at one time the provision of treatment facilities, it now has changed to prevention and early detection The problem in the field of preventive mental hygiene is much greater than in tuberculosis, both in terms of number of cases needing help and in evaluating successful methods of prevention

There are however ways and means at hand for attacking the problem, and I believe that with what we now know we can if we really apply it, make a significant dent in the problem

There are a great many complex factors which contribute to emotional stability in parents and children Many of these are beyond the control of the individual Anyone living in the uncertain and complex world of today is constantly aware of this Who can be calm and relaxed patient and sensible, day in and day out in these times? However, there is good evidence to show that if the first few years of a child s life can be a reasonably calm, happy, satisfactory experience his resistance" to subsequent disturbing factors and situations will be good He will have his ups and downs, but with intelligence and sympathetic help he will weather it through There is a limit to this resistance in all of us as was shown most clearly by the war experience of men in active combat. Degrees of resistance were apparent but after a long enough period of continuous exposure essentially 100 per cent broke down Actually, this is not too striking in view of the awful situations which the men were called upon to face and yet it shatters the myth of breakdown being only the part of the weak If these men were weak, who then is strong?

What can be done to insure that children will have the kind of start that will give them "resistance?" Perhaps it is better to examine this in terms of what in the average situations, prevents a child from having a healthy happy satisfactory infancy and early childhood

Although social and economic pressures play a significant role more in some instances than in others, I do not believe that they are the largest contributing factors The emotional adjustment of the parents particularly as this is disturbed by the anxieties which are the normal complications of being a parent is to my mind, the most important factor

There is no good preparation for being a parent unless it is having a satisfactory growing-up experience oneself One might think that doctors nurses school teachers and psychologists would be the cream of the crop I need not belabor this point further Thinking, even though it be founded on the best available knowledge, usually cannot withstand the onslaught of the feelings which are stirred up because this is our baby We feel quite naturally that he is unique and beyond the rules and facts which apply to others Not even experienced pediatricians know all the answers about children s physical behavior What can you expect an inexperienced parent to know or to apply correctly when the weight of parental responsibility rests so heavily on his or her shoulders?

There are all kinds of anxieties which beset parents. There are some which should be called normal These include the uncertainty as to whether the baby is normal physically and mentally whether development is proceeding satisfactorily whether the mother is correctly feeding and caring

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for her baby, and, most important, the basic anxiety which a mother has as to whether she is really capable of being a mother in the full sense of the word—whether she is really capable of helping her child to grow up This latter problem is not one that mothers discuss much or even admit to themselves It is manifested by a variety of behavior patterns, such as too much care, generalized tenseness and anxiety, a forced lack of concern, or actual indifference If things go well, it may disappear, but, if there is colic, vomiting, restlessness, or other persistent disturbing symptoms on the part of the baby, it may increase the basic anxiety in the mother and lead to an exaggeration of her pattern of behavior In some situations it can go from bad to worse so that instead of the mother getting great joy and satisfaction from her baby she may have deep inside her a great resistance against this little creature who has so terribly upset her former even existence

This may be a slightly overdrawn picture, but there are all sorts of variations, and even if rejection does not take place, the mother can be made to feel so guilty because of her inadequacies that this guilt will prevent her from using her skill and intelligence in a natural, relaxed manner She becomes anxious, tense, and stiff and does things which, under ordinary circumstances, she would never think of doing

Babies are reasonably alert creatures, and if the mother is chronically upset, you seldom find a happy or relaxed baby The mother will be incapable of picking up her crying baby and holding him in such a fashion as to relax and soothe him She may be driven by her anxieties to all sorts of extremes and excesses such as ramming food down his throat or insisting rigidly on an early pattern of toilet behavior

This is no "pipe dream" Any of you who have had opportunities to follow mothers and babies through the first few years of life can vouch for the prevalence of such situations A great deal of this, I believe, is entirely preventable if the one person who accepts, welcomes, and, indeed, guides an entry into the family during these crucial months and years knows how to help This person is the pediatrician or the family doctor His role, if he choses to play it, is to make himself the kind of person with whom the mother will feel free to share her anxieties, without fear of ridicule, criticism, or indifference It is these qualities which the mother fears, often without cause, which prevents her from sharing her fears in their incipiency with someone who can really help If the physician is aware of what mothers are going through and how hard and embarrassing it is to share it with someone else, he can skillfully help the mother to unburden herself If, by his attitude, he is sympathetic, and if, by his advice, he shows that he really understands, the mother has found a real ally She then feels free to discuss small difficulties at the start and will not feel that she must spare the doctor until she has a problem troublesome enough to interest him By that time it is of such proportion that the physician really is not interested He is filled with anxiety himself, because he does not know what to do and wishes the mother had never consulted him

Pediatricians and family doctors are not equipped by training, nor does their practice provide the time, for extended psychiatric treatment of developed behavior problems It is true that they may often have to do the best they can, because there is no one else available Psychiatric treatment on any intensive level is not and cannot be a part of their standard armamentarium They should, however, be able to understand the problem and should know enough about emotional development—which is another way of saying "human nature"—to be able to give sound advice They should be able to recognize what they can and cannot handle, just as the neurologist treats some neurologic conditions and sends others to the neurosurgeon

I have digressed somewhat since I started to talk about a child guidance clinic I want to return to it now and come back to the title of this paper The things I have been describing can and should be taught to medical students and house officers, particularly if they are going to be family doctors or pediatricians Eventually, I hope, these things will be taught by the attending physicians on the wards and in the outpatient clinics, just as how to listen to a chest or feel an abdomen is now taught That day, however, is not yet here

At present, someone has to be available who has had some special knowledge of the usual patterns of emotional growth and the factors which help or hinder its development to complement what is now taught about physical disease, its diagnosis, and its treatment Both because teaching budgets are what they are and because such a man must constantly expand his basic knowledge by treatment experience, a child guidance clinic as an integral part of a children's hospital is essential Furthermore, I am a believer in the close relationship of child guidance to clinical medicine (I am for the moment, omitting the advantages which such a clinic can offer to individual patients and their families) It is not easy to combine these functions of treatment and teaching, because the pressure for service and for treatment of individual children is tremendous However, if one sees the vital role which the informed, sympathetic physician can play in insuring that greater numbers of children can grow up to be emotionally stable, productive, and happy people, there will be no question about time being set aside for such teaching

I have not touched on the question of time involved Time or lack of it has been one of the major arguments advanced against physicians doing much in the preventive mental hygiene field Actually, doing the sort of thing that I have described briefly will save the doctors time in the long run. They will have spared themselves the frustrating experience of devoting an unscheduled hour of busy office time to an involved emotional problem in the face of which they are helpless

Discussion

Harry Bakwin, M.D., *New York City* —Dr Little has outlined the teaching plan now in operation at the Children s Hospital in Buffalo It seems to me that the best feature of this fine plan is its integration with the pediatric service Dr Little is an essential member of the staff of the Children s Service Trained as a pediatrician and a psychiatrist, he can and does speak the language of both I can attest to the value of this program from conversation with members of the staff of his hospital

At Bellevue Hospital a child guidance clinic was established in 1927 as part of the general children s outpatient department The clinic has been operated from its inception by Dr Ruth Bakwin who is a member of the pediatric staff and who has ward and outpatient duties on the children s service similar to those of the other members of the staff At one time it was usual for members of the visiting staff to rotate through this clinic spending an afternoon a week for two or more years in the guidance clinic In this way the interest of the visiting staff in the psychologic aspects of pediatrics was roused and the gospel was spread I may say that at all times the number of cases which presented themselves for guidance has been at capacity The effort has always been made to use the guidance clinic as a consultation center and visiting staff members and interns have been urged to treat their own patients At the same time it was customary to present emotionally disturbed children at the clinical conferences, together with other cases of general pediatric interest All along the line we have been fortunate in having the benefit of consultation with Dr Lauretta Bender regarding intricate problems.

For the past fifteen years or so discussion of the psychologic aspects of pediatrics has been an essential part of ward rounds We have tried to pay attention to the emotional and motor needs of infants and children in the same way that we attend to their ailments and to their nutritional needs Nurses and interns are urged to pick up the babies and talk to them and play with them and give them the tender loving care without which they wither and die Unhappy whiny children get special attention Sometimes a particular child is assigned to an intern for his special attention It is not unusual for each of the interns to carry a baby during ward rounds. In some instances we invite the parents to hold and fondle their babies. In the case of unhappy children the parents are asked to bring them to the outpatient department for consultations.

These maneuvers may seem obvious to you They were not obvious to the pediatrician a few years ago Because of the danger of cross infections in wards for infants, it was the practice to isolate them and to manipulate them only when necessary

A few years ago a seminar on psychologic aspects of pediatrics was organized for the fourth-year students in the department of pediatrics. At these seminars the students gave brief presentations on such subjects as emotional development, training problems undesirable habits etc. and these subjects were then discussed by the group These informal discussions for about 15 students were very popular

During the past two years a weekly session for the students has been organized in the department of psychiatry A patient is selected from the pediatric outpatient department and presented by a student The case is then discussed by the students Dr Lauretta Bender, and myself Unfortunately each group of students has only four of these exercises

During the past year Dr Wortis has assigned a member of the psychiatric staff to the department of pediatrics She spends five half-days each week with us, and her services are widely sought.

The pediatrician is actively interested in the psychologic aspects of the child—perhaps because so many of us have problems in our own families. The pediatrician is ready to integrate psychologic care into his general program of child care I believe that in this respect he is more receptive than the internist.

I may be prejudiced but it seems to me that the most important concern of the psychiatrist today should be the emotional health of the child It seems reasonable to assume that difficulties are more easily handled in their inception than after they have become firmly entrenched in the personality of the individual I believe also that the most important concern of the pediatrician should be the emotional health of his patients. The program for the physical care of the child is well established In the success of this program, which has exceeded the expectations of the most optimistic, we have been greatly assisted by the improvement in the general economic level of the country However we have become aware that in centering our interest on the physical welfare of the child, we have neglected his mental health Indeed by rigid prescriptions and exact formulations, often based on inadequate information we have in many respects actually done harm

We need more men in pediatrics with the sort of training and interest which Dr Little has We need wider recognition in teaching institutions of the importance of this subject We need more help from the psychiatrists A program for training child psychiatrists must be worked out which is realistic It is not possible for any large number of men to be thoroughly grounded in pediatrics and in pediatric psychiatry and adult psychiatry as well The strange language of psychiatry the aloofness of the psychiatrist and the division into various schools and subschools of thought—something unique to modern medicine—are important factors retarding the assimilation of modern psychiatric thought into pediatric practice

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At present, someone ha has had some special know terns of emotional grov which help or hinder its plement what is now t disease, its diagnosis, and because teaching budgets because such a man must basic knowledge by treatm guidance clinic as an integ hospital is essential Fur liever in the close relation to clinical medicine (I omitting the advantages v offer to individual patients is not easy to combine th ment and teaching, becaus ice and for treatment of tremendous However, if which the informed, symp play in insuring that great can grow up to be emotion

der girdle, chest axilla, or upper extremity in any or all areas This is often associated with numbness and tingling of the fingers and weakness of the grip The greatest intensity of pain is not necessarily referred to the arm or hand It may be in the paravertebral region in the area of the first and second dorsal level, the neck, the supra or infraclavicular region, or the axilla Not infrequently, there is associated occipital pain and tenderness There is often a sensation of weight or heaviness of the entire extremity This sensation may be so severe that the patient often states that it feels as though the arm is going to "drop off" The patient may complain of a cold hand

Paresthesias may affect the ulnar or radial portion of the arm and hand, or the entire hand may be involved Although numbness is a frequent complaint, anesthesia is not commonly demonstrable. In mild cases, there may be little or no pain, just a sensation of heaviness sometimes associated with paresthesia Elevation of the arm above the head may or may not give relief of pain Use of the arm which requires sustained elevation may cause severe pain. Examples are sweeping, shaving, or painting

There are several signs which suggest the presence of a scalene syndrome. These may be enumerated as follows

1 Fullness of the supraclavicular space

2 Tenseness of the scalene muscle only on the painful side

3 Reflexes may be diminished absent or normal

4 The grip is poor

5 Arterial amplitude and pressure changes take place with deep breathing and extension and rotation of the cervical spine

6 Reduced skin temperature of the hand may be present.

7 Forcing the head back and away from the painful side may cause increased pain

8 Rarely there may be increased skin temperature, causalgic areas on the dorsum of the lower arm and wrist prominent veins, and thickened fingers These signs are characteristic of pressure upon the subclavian vein

9 Compression of the anterior scalene muscle just above the clavicle causes intensified pain and distress as compared to pressure on the nonpainful side In this test, the thumb is placed about an inch above the clavicle forcing the posterior border of the sternocleidomastoid muscle medially Pressure is produced on the scalenus muscle of the nonpainful side Comparison on the painful side is then made In all cases the tenderness is much greater on the affected side, and the continued pressure intensifies the pain and distress

Although the maneuver eliciting the latter sign has been regarded as a good presumptive test it appears to be unreliable and may be compared to the straight leg raising test for sciatic pain It confirms the presence of pain along a certain pathway but does not give us a definite diagnosis The compression test will also give a positive response in cases of ruptured cervical disk osteoarthritis of the cervical spine or in other lesions which irritate components of the brachial plexus The pain is probably due to pressure or traction upon the nerves With a spastic scalene muscle this response can easily be mistaken for that of a primary scalene syndrome

I believe that inability to obtain relief in these cases by surgical intervention has mainly been caused by a failure to distinguish between the primary and secondary, or reflex types of anterior scalene syndrome.

A primary scalene syndrome is one in which symptoms originate and are due to an intrinsic disturbance of the anterior scalene muscle, spasm, hypertrophy, or myositis often due to trauma A secondary scalene syndrome may be defined as one in which symptoms are due to reflex spasm of the anterior scalene muscle caused by irritation of structures in the shoulder girdle or by disturbance of segments which innervate these structures It is extremely important that the two types be distinguished by clinical methods before attempting surgical procedures The primary type will obtain complete relief with procaine injection and surgery but the secondary or reflex type will obtain only partial relief Yet the signs and symptoms presented by each, may in certain instances be identical

Among the lesions which may cause reflex scalene spasm are intraspinal space taking and inflammatory lesions of the cervical spine radiculitis of the fourth to seventh cervical nerve roots malignancy of the cervical spine disease trauma or inflammation in or about the shoulder joint, and disease trauma, or inflammation of skeletal structures supplied by the fourth to seventh cervical segments including the central diaphragm and the pericardium Interesting phenomena are the reflex scalene syndromes which may follow coronary thrombosis

Several observers have mentioned the fact that a reflex scalene contracture may take place due to irritation of skeletal structures of the shoulder girdle or by irritation of nerves which supply these structures Such a secondary or reflex scalene syndrome causes a superimposed or overlapping pain picture upon the original lesion often masking the focus of pain In 1939 Bishop cited in detail one of 11 cases in which a calcified supraspinatus tendinitis caused a reflex scalene syndrome with typical symptoms including spasm and ten-

derness on pressure and changes in oscillometric readings with sensory and temperature changes [10] The swelling of the hand, pain in the arm, and sensory changes, as well as the fullness and tenderness in the region of the left scalenus anticus muscle, disappeared within a few hours after the operation and did not return

In many instances, the reflex contracture appears to cause signs and symptoms which are identical to those of a primary scalene syndrome There may be fullness of the supraclavicular space with a tense tender scalene muscle, and the grip is weakened Pain, numbness, and tingling of arm and hand may be typical, the patient may obtain relief by elevation of the arm There may be changes in arterial amplitude and manual compression of the lower end of the scalene muscle which causes intensified pain and distress At times, the pain from the reflex scalene contracture is of greater intensity than that of the original source of stimulus, so that, in spite of the fact that typical signs are present, we cannot be sure whether we are dealing with a primary or secondary syndrome in all patients If surgery is done at this point without further investigation, the patient may fail to obtain relief

At the present time, the most dependable method of differentiation appears to be the test originally introduced by Gage in 1939 [6] This consisted of an injection of the anterior scalene muscle using 5 cc of 1 per cent novocain, taking care not to infiltrate the phrenic nerve or brachial plexus and waiting five to ten minutes for relief of pain Others have used as much as 10 cc After applying this method for a period of time, anesthesia of the sympathetics as well as partial anesthetization of the brachial plexus were not infrequently encountered, thus nullifying the test In order to lessen the incidence of brachial plexus and sympathetic anesthesia following the injection, the technic was modified Instead of 5 cc of the 1 per cent novacaine, $1^1/_2$ to 2 cc was injected, and we attempted to localize the muscle infiltration more accurately A $^3/_8$- to $^1/_2$-inch needle is used to prevent too great a depth of injection The time element is reduced to three minutes It is possible in most instances, by forcing the clavicular insertion of the sternocleidomastoid medially, to isolate the lower portion of the scalene anticus muscle between two fingers so that it can be directly infiltrated The technic of this procedure is as follows

The patient's head is brought to the painful side to relax the sternocleidomastoid muscle The clavicular insertion of the sternocleidomastoid muscle is pushed medially, at the same time forcing the fingers inward and downward The patient is instructed to take a deep breath and hold it As inspiration takes place, the scalene muscle can be felt to tighten The muscle is straddled by two fingers and, at the same time, the head is tilted toward the opposite side and slightly retracted The fingers are forced inward on either side of the muscle, so that the pressure causes the muscle to bulge forward A $^3/_8$- to $^1/_2$-inch needle is inserted between the fingers directly into the belly of the muscle, and $1^1/_2$ to 2 cc of 2 per cent procaine are injected In patients with short, heavy necks or with a tight sternocleidomastoid muscle, it is not always easy to separate the anterior scalene muscle so that it can be accurately infiltrated It may be necessary to inject these cases on more than one occasion in order to satisfy oneself that a satisfactory infiltration has been made

In primary cases, the response is rapid and dramatic The patient loses the heavy sensation, the pain disappears, the tingling stops, and the grip is restored to normal—all within a matter of minutes

It is the immediate effect following injection which determines whether or not a primary syndrome is present If the pain disappears completely within a three-minute period without signs of sympathetic or brachial plexus anesthesia, a primary syndrome may be suspected The more rapidly pain disappears, the more likely it is that a primary condition exists In addition to this, it is important that a re-examination be made the moment the patient states that the pain is relieved Deep pressure or percussion over the cervical spinous processes with a hard rubber hammer often elicits acute tenderness in the lower cervical spine If the patient has considerable relief of the pain following the injection and these tender points are found, or if pain develops on flexion, extension, or rotation of the spine during the relief period, one should be suspicious of a lesion in the lower cervical spine and not conclude that the condition is one of a primary scalene syndrome It is better to wait and note the effect of a series of infiltrations and observe whether or not pain completely disappears following each infiltration or whether it disappears to a certain degree Rotation of the neck is not sharply limited by a painful catch to either side when a primary scalene syndrome is present This is usually due to other pathology in or around the cervical vertebra A scalene syndrome does not cause stiffness of the cervical spine Painful or limited motion of the shoulder joint is not caused by a primary scalene syndrome

Although Gage first suggested a differential diagnostic injection in 1939, Kaplan, in 1941, was the first to recommend repeated procaine infiltration as a form of therapy [6 11] The best conservative treatment of a primary scalene syndrome is repeated procaine infiltration Postural correction

and physical therapy are of additional value If after four treatments, sustained relief is not obtained, the muscle should be transected If progress is made, injections may be continued If progress becomes stationary, the amount of residual pain should be the guide for surgery Over 80 per cent of patients will obtain clinical relief of pain by repeated infiltration These figures are in accord with Hansson who states that only 15 to 20 per cent require surgery [12] His patients were treated by postural correction and physical therapy

In a secondary scalene syndrome, the muscle should not be sectioned. Infiltration of the muscle will give only partial relief Search must be made for the underlying lesion X ray studies should be made of the cervical spine, upper dorsal spine, scapula, chest, and shoulder joint.

There is no doubt that in certain patients the differential procaine test may fail to give the desired information. In these instances the failure could be due to anatomic variations For example, pain has been reported due to compression of a nerve root by a scalenus minimus muscle. In another patient the lateral edge of the cervical fascia became thickened and hardened and compressed the third portion of the subclavian artery, and the patient obtained no relief until this fascia was released. Anomalies of the first rib have been reported as causing compression and irritation. It is conceivable that edema due to compression, involving either the nerves or other structures which might produce pain, could not subside in the short time required to produce the anesthesia and release of the anterior scalene muscle However, all of these variations do not appear to be common, since in most instances of what appeared to be anterior scalene syndrome we were able to obtain immediate relief of the symptoms This relief, of course, does not always apply to those cases in which there is direct compression, such as a cervical rib or where there is vascular compression due to narrowing of the costoclavicular space. The rapidity and degree of relief depends on factors causing the compression and on the rigidity and fixation of the structures involved In one instance, a patient obtained complete relief following infiltration of the anterior scalene muscle, and we would have presumed that this was an anterior scalene syndrome had we not felt a nodule behind the muscle which proved to be a metastatic lesion due to a primary growth in the lung Unless signs of vascular compression or changes in arterial amplitude are marked, they do not appear to be of positive value. These changes appear to be of more value if found in the rest position In many instances one can produce a decrease in the pulse volume in patients who do not suffer pain by applying the various maneuvers which are supposed to be diagnostic of the scalenus anticus syndrome Those cases in which anatomic variations have produced the symptoms which cannot be released by a scalene infiltration cannot be accurately diagnosed until these structures have been exposed and the points of compression observed Surgery of this type is of course, exploratory One cannot therefore be sure at all times that a scalenus anticus syndrome does exist, except in those forms where it is actually due to spasm which is released by anesthesia

Simulation of Anterior Scalene Syndrome

Narrowing of the costoclavicular space which compresses the subclavian vessels produces symptoms identical to those of a scalene syndrome Injection of the muscle gives no relief Resection of the portion of the first rib underlying the subclavian vessels may be necessary to effect a cure

Pain in the elbow region due to an external epicondylitis and extensor tendinitis is often associated with subjective numbness and tingling in the fingers The epicondyle is tender to pressure and rolling the tendons under the examining finger often causes reflex paresthesia to the hand This pain may be aggravated by asking the patient to grasp a large object with all the fingertips and squeeze hard This causes pain in the elbow region and extensor tendons below Infiltration of the acute tender points at and below the epicondyle with 3 to 5 cc. of 2 per cent procaine often causes disappearance of pain and paresthesia depending upon the accuracy of infiltration

Pain in the shoulder girdle and lower arm is often due to reflex radiation which has its origin in the infraspinatus fossa The trigger point is about 3 5 cm. below the midspine of the scapula. Pressure and rolling with the finger often reproduces and intensifies the painful radiation to the shoulder and arm. This point should not be labeled as a fibrositic deposit, as it is constant in its location. We believe that it is the branch of the suprascapular nerve which supplies the infraspinatus muscle—a Valleux point. This point is located and infiltrated with procaine by passing the needle down until contact is made with the scapula Three cubic centimeters are injected The needle is withdrawn slightly, and another 3 to 5 cc. are injected This syndrome may exist alone or is found in conjunction with other shoulder lesions

Brachialgia statica paresthetica is a condition due to a mechanical irritation of the lower cord of the brachial plexus which causes numbness and tingling in one or both hands. There is usually no pain This syndrome may simulate a scalene syndrome. Any pathology which causes inflammation or compression of the subclavian vessels or the brachial plexus or any lesions of the shoul-

der girdle, including the cervical and upper dorsal spine, may produce pain simulating an anterior scalene syndrome

None of the preceding conditions which simulate an anterior scalene syndrome are relieved by a diagnostic infiltration of the muscle

The mere fact that an examination is made in search of a scalene syndrome makes us aware of segments and structures which may be directly or reflexly involved In reflex syndromes, the diagnostic injection is of great value because it erases the overlap of the scalene picture and allows better localization of the original point of stimulation In certain instances where two lesions exist, one overlapping the other, it is impossible to arrive at a correct diagnosis without use of this procedure

Summary

It is not the purpose of this paper to imply that an accurate diagnosis of scalenus anticus syndrome cannot be made without the use of a diagnostic injection However, I believe that the use of this technic will prevent a considerable percentage of failures in diagnosis and surgery and will give us one more effective means of therapy

References

1 Murphy J B Ann Surg 41 399 (1905)
2 Murphy T M J Australia 15 582 (1910)
3 Adson W A., and Coffey, J R Ann Surg 85 839 (1927)
4 Naffziger, H G Surg, Gynec & Obst 64 119 (1937)
5 Cogswell H D Arizona Med 3 232 (1946)
6 Gage I M Surgery 5 599 (1939)
7 Swank R L and Simeone F A Arch Neurol & Psychiat 51 432 (1944)
8 Nachlas I W South M J 35 663 (1942)
9 Semmes R. and Murphy F J A.M A 121 1209 (1943)
10 Bishop W A Arch Surg 39 231 (1939)
11 Kaplan, L Arch Surg 42 739 (1941)
12 Hansson K. G Arch Phys Therapy 22 622 (1941)

REAWAKENING OF CHRISTIAN FAITH NEEDED

To combat the insidious encroachment of Godless and destructive ideologies into our land, there must be a reawakening of Christian faith A people without belief in a Supreme Being cannot long endure Marx in *Das Kapital* wrote, "The democratic concept of man is false because it is Christian The democratic concept holds that each man is a sovereign being This is the illusion, dream and postulate of Christianity" Over 250 years ago William Penn said "Those people who are not governed by God will be ruled by Tyrants"

The preservation of freedom in our country is everybody's job It is not unusual to hear physicians say, "Well, what can I do?" There is no distinction between John Smith, M D, and John Smith, citizen The unfortunate tendency of members of our profession to become self-centered, isolating themselves from community activities, has deprived their neighbors of wise counsel and allowed do-gooders and social reformers to carry on programs which, distasteful to our profession, are mere steppingstones to a complete surrender to foreign ideologies ultimately resulting in destruction of freedom

It requires more than lip service Great demands will be made upon your time and energy Is it worth it? If you believe that you can influence and help your fellow Americans in the field of education, government, labor-management, newspapers, books, and radio, and strengthen those principles which we, as Americans, hold dear and which mean so much to you now, and which should guide your children in a happy, prosperous and God-loving world in the future, it is your privilege and duty to act now Should you be lax in your duty or indifferent to the challenge, it might be well to recall the words of President William McKinley when he said "Our strength rests in our patriotism Peace and order and security and liberty are safe so long as love of country burns in the hearts of the people Liberty, my fellow citizens, is responsibility, and responsibility is duty, and that duty is to preserve the exceptional liberty we enjoy within the law and for the law and by the law"—

From an address by Dr Joseph H Howard, Bridgeport, Connecticut, at the Annual Conference of State Society Presidents, Chicago, June 20, 1948

ELECTRONARCOSIS IN PSYCHIATRIC THERAPY

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SINCE the introduction by Cerletti and Bini in 1938 of the electrical method of producing therapeutic convulsions in psychiatric patients, a number of variations of the electrical characteristics of the stimulating current have been developed and employed in clinical practice [1] The reasons for the attempts to alter the electrical characteristics of the current used in shock treatment may be briefly summarized as follows (1) to increase the therapeutic effect of electric shock treatment, (2) to employ the least amount of electrical energy which would be compatible with the maximum therapeutic effect (3) to produce the least amount of cerebral pathologic change and fewest undesirable complications, and (4) to minimize confusion and memory disturbance in the patient

Changes in the electrical characteristics of any stimulating current may involve changes or variations in the following

1 The wave form, e g , rectangular waves, variations of the sine wave, and spike pulses
2 The duration of the individual wave or pulse
3 The frequency (rate of occurrence per second) of the waves or pulses
4 The peak voltage of the waves or pulses ("amplitudes")
5 The use of unidirectional waves or pulses (rectification of alternating current)
6 Combinations in differing degrees of the above variations.
7 Variations in the total time of application of the applied stimulus with usually corresponding inverse variations in the strength of the current applied.

It is obvious that many varieties of alterations of electrical characteristics can be employed The Cerletti-Bini technic is the original form of electrical stimulus and utilizes unmodified sine wave current alternating at a rate of 50 or 60 cycles per second, which is the common type of A C house current. Most of the shock treatment units still in clinical usage and still being manufactured employ this type of current. There are two general types of apparatus constructed to deliver this current, one which applies a predetermined voltage to the head and one which delivers a predetermined current which remains constant over large changes in electrical resistance of the head

Most apparatus is constructed so that a predetermined voltage is applied to the head between bitemporal or vertex temporal electrodes The voltage generally may be any value from 90 to 130 volts, while the duration of stimulus varies from one-tenth to four tenths second The current traveling between the electrodes applied to the head has generally varied from 300 to 1,000 milliamperes and is not a constant value. This is the type of stimulating current that Cerletti and Bini employed

Apparatus which employs a predetermined constant current as the stimulating current to produce the usual convulsive treatment is a somewhat later development wherein the current is maintained at a constant level during the treatment over a reasonably wide range of impedance changes in the tissues between the electrodes These usually deliver a lower current (up to a maximum of 300 milliamperes) than the fixed voltage apparatus Because of the lower current, which can be regulated a more prolonged time factor is utilized, varying from five-tenths to five seconds, for the production of the ordinary convulsive treatment.

Electronarcosis therapy involves a considerably longer application of a predetermined constant current of the sine wave type for a minimum total period of four minutes. This method of treatment was developed chiefly by Tietz *et al* in California in 1945 and 1946 although considerable experimental work with electrical narcosis in animals had been conducted since the early 1930 s by Van Harreveld, Wiersma and associated investigators.[2–7] An initial current varying from 160 to 200 milliamperes (which is considerably lower than that employed in ordinary electric shock therapy) is applied by bitemporal electrodes for the first ten to thirty seconds during which time the patient remains in a tonic spasm The upper limbs are usually in tonic flexion and the lower limbs in extensor spasm The patient is usually apneic Initially there is a short cardiac arrest after which the heart beats slowly and often irregularly At the end of ten to thirty seconds the current is dropped to between 50 to 75 milliamperes at which time a short clonic phase ensues. Respirations begin in from several seconds to thirty seconds after the end of the clonic phase, and as soon as respiration is well established, the current is slowly increased again to a maximum of about 125 milliamperes

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The patient frequently develops respiratory stridor with increase in current, in addition to occasional motor restlessness In many instances, the maximum current of 125 milliamperes cannot be obtained because of the marked stridor or respiratory arrest of the patient, and, therefore, a lower current will be maintained to prolong the unconscious state of the patient

It might appear that the term electronarcosis is a misnomer since the patient actually is subjected to a modified form of convulsive seizure at the onset of treatment The difference between this seizure and those obtained by the use of the Cerletti-Bini technic is that the present one consists primarily of a long tonic phase of ten to thirty seconds' duration followed by a very short clonic reaction The subsequent long period of unconsciousness is a "subconvulsive" tonic reaction rather than a true narcotic state of the patient

More recently, Tietz introduced the "Glissando" technic for the application of this stimulating current, instead of applying the peak current initially, there is a gradual rise from zero to the peak value over a period of one second, and then the peak value is maintained for the desired length of time (ten to thirty seconds) This gradual but rapid increase of current tends further to minimize the severity of the initial muscular contraction and arching of the spine and thereby lessens the possibility of fracture

Almost a year ago, we instituted electronarcosis therapy at the New York State Psychiatric Institute and the Westhill Sanitarium, where the great majority of patients have been treated The work at the Psychiatric Institute was conducted in collaboration with Drs Horwitz and Kalinowsky, but since the material studied thus far at the Institute has been so small, the present report is based almost entirely on cases treated at the Westhill Sanitarium Most of these patients had been subjected to previous courses of electric convulsive therapy and/or insulin coma therapy without effect or with temporary effect

There is a total of 45 patients, 12 of whom are men and 33 women Thirty-nine of this group were diagnosed as dementia precox, three as manic depressive psychosis, and three as involutional psychosis Of the 39 schizophrenic cases, nine were classified as being the paranoid type, six the chronic catatonic type, and 24 hebephrenic The number of treatments administered to each patient varied from a minimum of six to a maximum of 32 The total number of treatments administered to this group was 575 with an individual average of 13 treatments The degrees of response to therapy may be roughly divided into four main categories grade A, complete remission of symptoms, grade B, considerable remission of symptoms with satisfactory social adjustment but persistence of some of the psychotic ideation and affect, grade C, partial remission of symptoms with partial improvement in social behavior (mild to moderate improvement), and grade D, no improvement

All of the manic depressives and involutional melancholias exhibited grade A improvement None of these patients showed any relapse during a period of two months following treatment

In the schizophrenic group all paranoid and all catatonic patients exhibited B or C improvement at some time during or immediately after treatment This improvement, however, was only temporary in six of the nine paranoid patients and in four of the six catatonic cases, they exhibited return of symptoms within a period of one month after termination of treatment Of the 24 hebephrenic cases, 19 were substantially or moderately improved (grades B and C), while five of the patients were essentially unchanged However, 13 of the 19 improved patients showed relapse, while the remaining six cases maintained their initial improvement Thus, in the combined dementia precox group, 11 of 39 patients, or 28 per cent, were substantially improved and maintained this improvement for a period of at least one month following treatment

However, these statistics alone may be somewhat misleading without further qualifying the types of patients with which we were dealing They included, to a large extent, those patients who had been ill for a considerable period of time and who also had been subjected to other forms of shock treatment, such as the ordinary type of electric shock and insulin coma therapy Seven of the patients had been ill for over ten years, and the remainder of the group, with three exceptions, had been ill for periods exceeding one year It is noteworthy that all of the cases which responded to treatment and maintained this beneficial response were ill for less than five years, seven of the 11 patients had been ill for less than two years The time duration of the illness, therefore, is of considerable importance in obtaining a good result Generally, symptoms were considerably improved after three or four electronarcosis treatments, and only six to nine treatments were required for the depressive disorders

A larger number of treatments had to be given to the schizophrenic patients, the hebephrenic group receiving the greatest average number per patient

A very striking observation noted in the schizophrenic patients was the remarkable improvement which some appeared capable of showing, even when the illness was of long duration and it

was possible that the patient might soon relapse into psychotic behavior when "sustaining" treatments were not given In one case a woman, aged twenty-six, who had been ill for about ten years and diagnosed as dementia precox of the hebephrenic variety, played an excellent game of tennis for the first time since the onset of her illness after she received three electronarcosis treatments However, one week after termination of her course of therapy (20 treatments), she relapsed

No serious complications such as fractures were observed in our series of patients, although routine post treatment x rays were not taken Other complications, such as post treatment confusion and memory loss, were somewhat less pronounced than with the usual electric shock treatments

As regards the comparative therapeutic value of electronarcosis with electric shock therapy, it appears to have definite superiority over the latter in schizophrenic psychoses and is certainly equally effective in the affective disorders. However in the latter cases which respond so well to electric shock therapy, there is no need for electro-narcosis *With respect to insulin therapy*, it is our impression that in certain instances electronarcosis has been definitely superior The superiority has not consisted so much in the occurrence of permanent improvements, when these patients had not been permanently improved from previously administered insulin therapy but rather in the greater degree of improvement which these patients showed, as contrasted with their responses to insulin In these cases, after the initial course of electronarcosis was given, sustaining treatment at the rate of about one treatment per week was administered to maintain improvement thus cannot be done with insulin coma therapy

Although we should not be too hasty to substitute electronarcosis in place of insulin therapy without extensive clinical trial it represents a significant step forward in the therapy of schizophrenic patients, especially of the paranoid type who have been refractory to other forms of shock therapy

If electronarcosis treatment is proved to be equally as effective as insulin coma treatment which Tietz and her co workers claim, it would be of *considerable importance* *Insulin treatment is a* lengthy treatment, requires a relatively large force of trained personnel, and the number of patients who can be treated is greatly limited by the shortage of bed space in the State hospitals and sanitariums The electronarcosis treatment is a controlled treatment i e under the control of the physician at all times, and can be terminated immediately without difficulties, it appears to be associated with less risk and fewer complications than insulin treatment

Certainly, regardless of the future outcome of electronarcosis treatment at the present time it *provides new avenues for study and research into* the treatment of the psychoses

563 PARK AVENUE

References

1 Cerletti, U and Bini L. Arch. gen. Neurol. Psichiat Psicoanal. 19 266 (1938)

2. Tietz Esther B Thompson, George N Van Harreveld A and Wiersma C A. G Am. J Psychiat. 101: 821 (May) 1945.

3. *Idem.* J Nerv & Mt. Dis. 103: 144 (Feb.) 1946

4 Van Harreveld A Plessett, M S and Wiersma C A G Am. J Physiol. 137: 80 (Aug.) 194..

5. Van Harreveld, A. Tyler D B and Wiersma C. A G ; *ibid* 139 171 (1943)

6. Globus, J H Van Harreveld, A and Wiersma C. A. G J Neuropath. & Exper Neurol 2: 203 (July) 1943.

7 Frostig, J P, Van Harreveld A. Tyler D B Resnick S. and Wiersma C A G Arch. Neurol. & Psychiat. 51 232 (Ma) 1944.

MENINGITIS LOSING ITS STING ARMY REPORTS

Spinal meningitis, terror of World War I training camps, has today lost much of its menace according to a report by Dr Worth B Daniels submitted through the Office of The Surgeon General of the Army in the *Archives of Internal Medicine*

The report points out that less than three per cent died of some 14,500 soldiers treated during the World War II period for this once almost hopeless infection The remarkably low death rate was due Dr Daniels said, both to the efficacy of sulfadiazine and penicillin in controlling the infection and to quicker diagnosis Early diagnosis and the prompt use of the drugs can usually stop the spread of the bacteria before they have a chance to become localized in the linings of spinal cord and brain.

Altogether there were about 300 deaths from meningococcic infection in World War II Approximately ten per cent of these died before the germ had become localized in the nervous system tissues

The war experience *Dr Daniels says, shows that* sulfadiazine is the best available drug It is not so effective as penicillin against the bacteria in the blood stream but the latter drug proved to have one great disadvantage

While penicillin circulates through the blood stream freely it does not get into the cerebrospinal fluid in predictable quantities and hence cannot be relied upon to prevent invasion of brain and spinal cord tissues. Sulfadiazine enters the spinal fluid rapidly in high concentrations

AN EVALUATION OF HYDRYLLIN (DIPHENHYDRAMINE AND AMINOPHYLLIN) IN THE SYMPTOMATIC TREATMENT OF ALLERGY

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THE antihistamine drugs have proved of decided value in the treatment of various allergic disorders It is generally agreed by various investigators that the most satisfactory therapeutic effects have been noted in the treatment of hay fever and urticaria, successful results having been reported as high as 85 per cent in some instances [1 2] The most popular drugs in use have been benadryl (diphenhydramine hydrochloride) and pyribenzamine (tripellenamine), and the results did not vary greatly whether one product or the other was used So great has been the popularity of these chemical agents that many patients discarded specific therapy and relied entirely upon the use of these drugs, sometimes with disastrous results

In other forms of allergic disease these drugs have generally proved to be disappointing, although there were some early reports of success in bronchial asthma, with figures running as high as 60 to 75 per cent good results [3–5] Later investigators did not substantiate these early findings Feinberg obtained relief in 12 per cent of 50 cases of asthma treated with benadryl and in 28 per cent of 121 cases treated with pyribenzamine [6] Schwartz and Levin reported good results in eight out of 20 cases of asthma (40 per cent) treated with benadryl, and Lockey in 33 per cent of 21 cases of intractable asthma treated with the same drug [2 7] Koelsche, Prickman, and Carryer also reported benefit in only four out of 12 cases, or 33 per cent, of bronchial asthma treated with benadryl [8] The results of therapy with benadryl were also disappointing to Todd, who noted the poor results obtained with this drug in the treatment of bronchial asthma [9] It is possible of course, that the mechanism involved in the asthmatic attack is not the release of histamine, and hence the failure of antihistaminic therapy

Some of the failures in the use of the antihistaminic drugs may have been due to the high degree of side reactions occurring during the course of the therapy This very often necessitated the discontinuance of the drug before a satisfactory trial could have been made These reactions were mild in some patients but so intense in others that the drug was discontinued after the first dose Other patients were able to tolerate the drug only after persisting in its use, so that early side reactions [illegible] for discontinuance of the therapy Among the common side reactions noted were drowsiness, lassitude dizziness, nervousness, insomnia, dryness of the mouth, nose, and throat, headache, palpitation, dysuria, nausea, vomiting, diarrhea, and, at times, the induction of an attack of bronchial asthma The incidence of these reactions has varied from 17 to 29 per cent with pyribenzamine [10 11] With benadryl, toxic symptoms have been reported in 50 to 60 per cent of the patients taking the drug [2 6]

Hydryllin, produced in tablet form, is a combination of 25 mg of diphenhydramine base and 100 mg of aminophyllin * The rationale of this combination has been questioned in the report of the Committee on Therapy of the American Academy of Allergy, since the drug is a combination of two already known preparations, and it is understood that these drugs can be prescribed individually [12] The combination of these two drugs should theoretically be beneficial in the treatment of bronchial asthma because of the well-known therapeutic effect of aminophyllin and the antihistaminic effect of diphenhydramine (benadryl) Furthermore, the stimulating effect of aminophyllin on the central nervous system might counteract the depressant effects of benadryl, diminishing or avoiding toxic reactions [13]

It is the purpose of this paper to report on the use of Hydryllin in a group of 81 cases of allergy, including 46 cases of bronchial asthma At the onset it was decided that the initial dose would be one tablet to be taken at night, and subsequently the dose was to be increased to as many as six tablets daily, depending upon the therapeutic effects or toxic symptoms encountered In some cases even one tablet could not be tolerated, in others, by pushing the dose, the patient could tolerate three to six tablets daily, and, finally, in another group, beneficial results, obtained by having pushed the dose to six tablets daily, were maintained on a reduced dosage of one tablet daily for a period of time

From Table 1 it can be seen that in a group of hay fever cases, 14, or 52 per cent, obtained definite relief (50 to 100 per cent amelioration of symptoms) with Hydryllin In some cases relief followed immediately after the first use of

* Hydryllin tablets were generously supplied by G D

TABLE 1

Diagnosis	Cases	No Relief	Relief	Per cent Relieved
Asthma	36	11	25	69
Asthma, hay fever	8	3	5	62 5
Asthma, perennial allergic rhinitis	2	0	2*	100
Hay fever	22	13	14	52
Perennial allergic rhinitis	6	5	1	17
Urticaria	1	1	0	0
Allergic bronchitis	1	1	0	0
Total	81	34	47	58

* Relief (nasal symptoms only)

the drug but in other cases it was necessary to increase the dose to three to six tablets daily In 45 per cent of the cases there was either no relief or only slight relief of symptoms and in one case the patient was actually worse with the development of a severe headache necessitating the discontinuance of the drug These results in the treatment of hay fever are not so satisfactory as those reported with other antihistaminic drugs

In eight cases of hay fever complicated by pollen asthma, five or 62 5 per cent experienced good results. In one case hay fever symptoms were relieved with no apparent therapeutic effect on asthmatic symptoms while in another case asthma was greatly relieved but with no effect on hay fever symptoms.

In six cases of perennial allergic rhinitis the results were disappointing since in only one case was there any relief experienced from the administration of Hydryllin In two cases of perennial allergic rhinitis complicated by perennial bronchial asthma the effect of Hydryllin was excellent on the asthmatic symptoms, but the nasal symptoms were not relieved at all

While in this group there are not a sufficient number of cases of urticaria and allergic bronchitis worthy of discussion, the results in our two cases were poor In fact, in the case of allergic bronchitis the symptoms were fairly well controlled by the administration of 50 mg of pyrilbenzamine three times daily

However, in the group of 36 asthmatics and ten asthmatics complicated by or complicating nasal allergy the results were decidedly better than have been experienced to date with other antihistaminic drugs It is acknowledged that recent reports in the literature have failed to confirm the earlier reports of the beneficial effects of antihistaminic drugs in the treatment of bronchial asthma The latest figure claimed for pyribenzamine is 26 per cent of cases of bronchial asthma alleviated [14] Of our group of 36 patients with perennial asthma, 25 or 69 per cent, were definitely improved either during the acute phase of the asthmatic attack or when the drug was taken daily as a preventative It is true that new drugs often prove beneficial to asthmatics The continued use of a drug with beneficial results cannot be ignored In some of these cases three to six tablets daily were necessary for relief of symptoms yet one tablet daily maintained this relief for as long as five months

In eight cases of asthma with seasonal hay fever five or 62 5 per cent, were relieved as noted earlier in this paper In the two cases of asthma with perennial allergic rhinitis both were relieved of asthmatic symptoms without any effect on the nasal symptoms Adding these ten cases to our 36 cases of uncomplicated asthma we find that, out of a total of 46 cases of asthma 32 or 70 per cent, were definitely benefited by the administration of Hydryllin These results in the use of Hydryllin in bronchial asthma have been striking and somewhat surprising since many of our patients have received either benadryl or aminophyllin previously without such beneficial results

Toxic Symptoms

Of the 81 patients in this group 30, or 37 per cent, experienced 71 toxic reactions of varying severity In 13 or 16 per cent, the symptoms were slight and were ignored In five or 6 per cent, the symptoms were moderate, but the drug was continued In 12, or 15 per cent of the group severe reactions requiring the discontinuance of the drug occurred after the first dose or after the administration of several doses In some cases, reactions to one tablet three times a day were overcome and tolerance established by pushing the dose to six tablets daily In a few reactions after the first few doses disappeared with persistence of the therapy As a rule when the toxic symptoms were severe, the patient did not wait for instructions to discontinue the drug The type of reaction encountered and the frequency of occurrence are indicated in Table 2

TABLE 2.—INCIDENCE OF THE OCCURRENCE OF TOXIC SYMPTOMS

Toxic Symptom	Occurrence (All Degrees)	Occurrence (Severe)
Drowsiness	17	4
Weakness	11	1
Fatigue	2	0
Headache	7	4
Dizziness	11	7
Nervousness	8	2
Tremor	1	1
Dry mouth	1	1
Nausea	6	5
Urinary frequency	1	1
Burning of throat	2	1
Belching	1	0
Nasal clogging	1	1
Nocturia	1	1
Flushes	1	0
Total	71 (30 patients)	29 (12 patients)

ssion

n the evidence presented in this group of es, it can readily be seen that the chief of Hydryllin as an antihistamine agent will the treatment of bronchial asthma, either or when complicated by other types of

Our results with Hydryllin are appar- better than those reported previously with histamine antagonists There can be no on as to the value of aminophyllin in this ation, yet in a good number of our cases ect of aminophyllin alone, given previously, t so striking Our figures compare favor- ith those reported by the Committee on y of the American Academy of Allergy much larger series of cases [12] While our actions have been tabulated as 37 per cent e group, our more recent experience with llin has demonstrated that such side ms can be expected in about 20 per cent of ses

mary

series of 81 cases of various types of allergy, llin (diphenhydramine and aminophyllin) oved beneficial in 32 of 46 cases (70 per of asthma and in 14 of 27 cases (52 per cent) of hay fever In eight cases of other types of allergy, the results were poor In the treatment of bronchial asthma, Hydryllin has proved to be a valuable remedy Of the 37 per cent toxic reactions in our cases, only 12, or 15 per cent, were severe enough to cause discontinuance of therapy While the most striking results were noted in the treatment of bronchial asthma, Hydryllin has also proved of some value in the treatment of hay fever

References

1 Arbesman C E Koepf G F and Miller G C J Allergy 17 203 (1946)
2 Schwartz E and Levin L NEW YORK STATE J MED 46 1233 (1946)
3 Eyermann C H J Allergy 17 210 (1946)
4 Levin S L J Allergy 17 145 (1946)
5 Farmer L and Spickschein H NEW YORK STATE J MED 47 1119 (1947)
6 Feinberg, S M J A M A 132 702 (1946)
7 Lockey S D Ann Allergy 5 420 (1947)
8 Koelsche G A, Prickman L F and Carryer H M Proc Staff Meet, Mayo Clinic 20 432 (1945)
9 Todd, L C North Carolina M J 7 308 (1946)
10 Fuchs A M Schulman P M and Strauss, M B J Allergy 18 385 (1947)
11 Arbesman C E Koepf G F, and Lenzner, A R J Allergy 17 275 (1946)
12 Communication from Committee on Therapy of the American Academy of Allergy (Feb) 1947
13 Goodman L and Gilman A Pharmaceutical Basis of Therapeutics New York Macmillan Co 1941
14 Report of the Committee on Pharmaceuticals and Medicaments American Academy of Allergy J Allergy 18 77 (1947)

SPAN IN U S NEARS 67 YEARS

average life's span of people in the United has climbed to a new mark of almost 67 years, ated on the basis of 1946 death rates, the Fed- ecurity Agency reported recently

new longevity figure represented an increase rly a full year over the average length of life ated for 1945 and a gain of almost two years he level prevailing in the immediate prewar of 1939 to 1941

agency's calculations, based on life tables for ompiled by the FSA's national office of vital ics, Public Health Service, showed also that pectation of life at birth for white females was) 3 years

increase marked the first time in the history s country that the biblical "three-score-and- years had been exceeded Life's expectancy creased steadily since the turn of the century, r as a result of control of infectious diseases formerly exacted a heavy mortality toll infants

tables showed that the average life expectancy ite males at birth was now 65 1 years

The average longevity for nonwhites, on the basis of 1946 figures, was 61 years for females and 57 5 for males, but the improvement between 1945 and 1946 was greater for nonwhites than for the white segment of the population In fact the agency noted a narrowing race differential in longevity since 1900

On the basis of 1945 life tables, the life expectancy of a newborn white female baby had been 69 5 years, compared with the newly issued figure of 70 3 years

A male white baby, who could now expect to live 65 years, could, on the basis of the earlier statistics, have looked forward to slightly less than 64 5 years

Among the nonwhites, a female baby's life expectancy had increased, on the basis of the 1946 figures, to 61 years, whereas the computations of the year before had indicated that 59 6 years lay ahead

A male nonwhite baby can count, on the average, on a span of 57 5 years, on the basis of the 1946 tables, a year earlier the statistics indicated that his term would cover 56 1 years

There was several years' discrepancy between the life expectancy of white babies and nonwhite babies

THE MANAGEMENT OF ANURIA IN ACUTE MERCURIAL INTOXICATION

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IN FEBRUARY, 1947, a Kolff "artificial kidney" was acquired by the Mount Sinai Hospital through the courtesy of Dr W J Kolff, Kampen, Holland and Dr A Hyman, New York. Since then, patients with existing or impending uremia have been referred as potential subjects for its use In each instance the oliguria or anuria was ascribed to reparable renal disease, usually of the "lower nephron nephrosis" type, where kidney damage is reversible and ultimate restitution of kidney function can be anticipated [1] Prior to admission to this hospital, each patient had received various types of treatment, but the prime purpose in all instances appeared to be directed at increasing the urinary output by administering large volumes of fluids intravenously

It was only when this medical management had failed to increase the urinary volume that the patients were referred for the possible use of the artificial kidney At this hospital a period of observation and study was instituted to determine whether the patient was to be subjected to the artificial kidney [2] It soon became evident to us that the conservative measures introduced in our preliminary period of study and observation could be continued to allow spontaneous resolution of the anuria A series of these cases will be published at a future date. It is the purpose of this paper to present as a prototype a patient with acute mercurial intoxication sent to us for dialysis by the artificial kidney who recovered without the benefit of mechanical intervention. This case is presented to emphasize the dangers of overtreatment, to indicate the possibilities of spontaneous resolution of acute toxic anuria, and to urge caution in evaluating the efficacy of the various mechanical methods currently advocated for the relief of acute anuria.

Case Report

Case 1—M W a 52-year-old white man was transferred to the Mount Sinai Hospital on May 1 1947 thirty-six hours after the ingestion of seven tablets (3 5 Gm.) of mercuric chloride in attempted suicide. Vomiting had started approximately twenty minutes after the tablets were swallowed but no tablets were identified in the vomitus Diarrhea had started approximately one-half hour after vomiting, it persisted for about eighteen hours then stopped abruptly The patient was admitted to another hospital two hours after the tablets were swallowed and emergency measures were instituted Gastric lavage was employed using tap water and protein-containing fluids and several colonic irrigations were done. Saline and glucose solutions were administered intravenously to combat shock A few cubic centimeters of bloody fluid were voided shortly after hospitalization but for the twenty-eight hours prior to transfer to this hospital no urine had been passed or obtained by catheter and the nonprotein nitrogen of the blood rose to 78 mg per cent The previous personal history family history, and habits were noncontributory There was no history of previous renal disease

Physical Examination—The patient was a well-developed, well-nourished and cooperative white man lying quietly in bed. His complexion was sallow The skin and mucous membranes appeared pale. Slight periorbital edema was present The tongue was dry The heart and lungs were normal The blood pressure in millimeters of mercury was 140/70 The abdomen was not distended or tender

Laboratory Findings—On admission a blood count showed the following red blood cells 3 100 000 per cu mm., hemoglobin 63 per cent (Sahli) and white blood cells 18 800 per cu mm with 72 segmented polymorphonuclear leukocytes 9 nonsegmented 14 lymphocytes 1 monocyte 3 eosinophils and 1 basophil Catheterization of the bladder failed to yield any urine Two cubic centimeters of urine which were obtained on the second day contained epithelial debris many white blood cells, 5 or 6 red blood cells, and 1 plus albumin Subsequent findings are indicated on Fig 1 The blood urea nitrogen on admission was 49 mg per cent and the carbon dioxide content of the blood was 31.2 volumes per cent

Course—The patient's physical and mental state deteriorated slowly with gradually progressing restlessness and confusion to the time of diuresis on May 8 1947 A moderately severe stomatitis was noted on May 2 and responded slowly to local treatment. Sacral edema and a few fine moist rales appeared on May 4 (sixth day of anuria) and persisted until a day after the diuresis. Diarrhea started on May 7 and lasted for three days. The blood pressure rose to 150/90 from May 4 to 6 but then returned to normal.

The course of the patient in relation to treatment is indicated in Fig 1 On the second hospital day fluids were restricted to less than 1 000 cc. nearly all of which was administered by mouth Small transfusions of whole blood were used to combat the anemia A protein-free, salt free 1,500 to 2 500 calorie diet was given Sodium chloride and sodium bicarbonate were administered in accord with fluctu

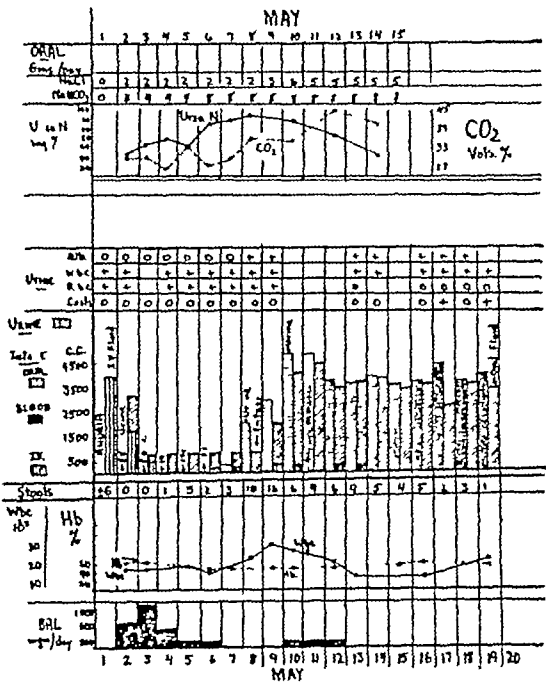


FIG 1 Anuria due to ingestion of 2 5 Gm. of bichloride of mercury Note the onset of diuresis on the eighth day

ations in the carbon dioxide and chloride content of the blood A course of 2-3 dimercaptopropanol (BAL) (3,000 mg in five days) was given, starting the day after admission, and repeated (540 mg in three days) with the recurrence of the diarrhea Toxic effects occurred after each injection and consisted of salivation, flushing, abdominal cramps, and nausea. On May 6 the patient voided 23 5 cc On May 7 the urinary output rose to 319 cc On May 8, the ninth day following onset of anuria, the urinary excretion reached 2,094 cc At this time, fluids by mouth were increased to correspond with the urinary output, and sodium chloride was given to replace the loss as a result of the diuresis The edema started to diminish the day after diuresis The patient's general condition improved markedly thereafter, and the patient was discharged on the twentieth day after admission, fully ambulatory and without complaints

The blood urea nitrogen rose to a maximum of 120 mg per cent on May 8 and fell slowly following the onset of diuresis The blood carbon dioxide content ranged from 28 1 volumes per cent on May 7 to 45 1 volumes per cent on May 12 Hematocrit values were 28 per cent on May 6, 26 per cent on May 9, and 31 per cent on May 14 The hemoglobin percentages on these days were 51, 48, and 55, respectively (Sahli) The blood serum chloride values (as sodium chloride) ranged from 527 mg per cent on May 3 to 630 mg per cent on May 10 The total proteins of the blood on May 3 were 4 4 Gm per cent, the blood serum sodium values were 134 milliequivalents per L on May 3 and 140 5 milliequivalents per L on May 5, 6 7 milliequivalents per L on May 9, and 6 3 milliequivalents per L on May 10

The blood calcium value on May 3 was 11 0 mg per cent, and the phosphorus was 3 0 mg per cent The stools remained guaiac positive until the seventeenth hospital day The urine continued to show albumin, white blood cells, red blood cells, and epithelial debris, but no casts were identified until shortly before discharge The specific gravity of the urine remained low, varying from 1 010 to 1 013 at the time of discharge

Follow-up —The patient returned for re-examination and laboratory studies on November 5, 1947 He had no complaints and had resumed full activity General physical examination was normal He was able to concentrate his urine to 1 024 after an overnight thirst The blood urea nitrogen was 14 mg per cent The phenolsulfonphthalein test revealed that 85 per cent of the dye was eliminated in two hours The urine was normal, acid, with no sugar, no albumin, and no formed elements on microscopic examination

Comment

The treatment of acute mercurial intoxication resolves itself into the management of the immediate poisoning and the delayed toxic effects of the drug The principles of emergency treatment are well established Attention is initially directed toward combating shock and facilitating the elimination and neutralization of the protoplasmic poison Shock is combated by efforts to maintain an adequate circulating blood volume, whole blood and plasma are the most effective agents available at present [3] Rejection of the mercury is accomplished spontaneously by vomiting and diarrhea shortly after ingestion Gastric lavage with protein-containing fluids is utilized to precipitate the mercury, and colonic irrigations are administered to aid removal of the poison from the large bowel Peters has warned of the dangers to the water and electrolyte balance (inherent) in prolonged lavage and irrigation [4] The use of sodium formaldehyde sulfoxylate to convert the mercuric ion to the insoluble mercurous ion has been advocated, but it is of questionable value and may be toxic if its administration is delayed [5,6]

If these measures are not promptly applied or are inadequate, then a significant amount of the drug is absorbed, and the mercury is concentrated at the sites of elimination, where the greatest toxic action is consequently exerted [7,8] Oliguria, colitis, and stomatitis result Anuria is the dreaded complication of acute mercurial intoxication In the series of Hull and Monte, 37 of 40 patients who suffered anuria for twenty-four hours or longer died [9] No patient survived who was anuric for more than three days Of the 72 fatal cases, the authors note that "excluding shock, relatively few died without uremic manifestation" The search for extrarenal factors in the production of anuria is essential throughout

the period of anuria However, distinction must be made between the early anuria due to in adequate circulating blood volume caused by vomiting diarrhea, and shock, and the later anuria which persists in the face of normal or increased circulating blood volume and is due to damage of the renal tubules [10] Standard text-books often fail to distinguish between these two phases of therapy, and the administration of large volumes of fluid (up to 10 L per day) has been advised [8] This distinction is therapeutically significant. Several months ago, a twenty-one year-old white man in acute anuria was received at this hospital He had been given 10 L of fluid intravenously in the forty-eight hours prior to admission in an attempt to 'open up" the kidneys Shortly after admission he died in massive pulmonary edema Bell notes that 'from the histologist s point of view it is difficult to see how any treatment could force necrotic cells to function It is also clear that the forcing of fluids is of no value in anuria of this form "[11]

It was recognized in our case that the anuria manifested at the time of admission to this hospital was probably due to intrinsic renal disease Although it is understood that the optimum time for administration of BAL is within three and one-half hours after the mercury has been ingested it was started forty-eight hours after the poisoning in the hope that it might neutralize any mercury concentrated either in the alimentary tract or kidneys [12 13] The previously described toxic effects of BAL were noted The possibility that the BAL contributed to the inhibition of the diuresis is not great.[14] The specific effect of the BAL in this instance cannot be evaluated

However, at this time no purpose could be seen in the use of the previously described measures which are directed primarily toward neu tralization of toxins by lavage and irrigation and toward combating acidosis by the intravenous administration of large amounts of sodium containing fluids [15,16] Our therapy was directed toward the maintenance of electrolyte equilibrium and the avoidance of pulmonary edema The patient was placed on a protein free salt-free diet (1,500 to 2,500 calories daily), which was maintained up to the start of diuresis The freedom from exogenous protein was introduced because of the anticipated short course of the illness *and the desire to use the endogenous* protein breakdown as a guide to the course of the azotemia [17 18] The salt free diet allowed the addition of measured amounts of sodium chloride and sodium bicarbonate to prevent severe aci dosis Fluids were restricted to less than 1 000 cc per day to replace the loss by insensible per spiration [19] No evidence of hemoconcentration was noted as manifested by the hematocrit. The marked diuresis in the presence of diarrhea indicates that in the presence of anuria, small amounts of fluids suffice to maintain an adequate circulating blood volume The slightly in creased serum potassium may indicate a release of intracellular water to the extracellular com partment Under this regimen, diuresis occurred on the ninth day following the onset of anuria With the establishment of diuresis fluids were increased to replace the output chlorides were administered in the form of sodium chloride to replace the chlorides lost in the diuresis and pro teins were gradually introduced into the diet [20 21] Despite the diuresis, the azotemia fell gradually and the specific gravity of the urine remained fairly fixed in its resemblance to glomerular filtrate [22 23] Examination of the patient six months later revealed a normal blood urea nitrogen a normal phenolsulfonphthalein test, and good urinary concentrating power

On the basis of available prognostic criteria this patient's chances for recovery were ad mittedly few [8 11] The ingested dose was large vomiting delayed, and the initial shock was followed by persistent anuria It is to be noted that the patient was relatively comfortable during this period of anuria despite the progressive azotemia This is ascribed to the adequate hydration maintained predominantly by oral fluids, the prevention of severe acidosis and the freedom from circulatory embarrassment Fish berg cautions that the excessive administration of fluid involves the danger of precipitating cardiac failure [24] Kugel in his review of 13 patients with acute anuria noted that nine showed clinical and pathologic evidence of pulmonary edema.[25] Only one lived more than nine days In Wol paw s and Adler's series, three patients died of pulmonary edema and the fourth died after aspiration of gastric contents [26] All died before the ninth day of anuria Case 2 of Campbell died of pulmonary edema on the seventh day [17] Iucké and others note the high mortality in the early days of anuria.[1,27]

Our experience is in keeping with others that spontaneous resolution of acute toxic anuria may be expected to occur from the eighth to the twelfth days Bell stressed the regeneration of tubular epithelium after the first week [11] Con sequently it appears that the treatment of a *potentially reversible anuria is to maintain the* patient until renal repair from the toxic insult can occur By the same token it is essential that the precipitation of pulmonary edema and severe electrolyte imbalance must be avoided It also becomes apparent that reports of cures or improvement by mechanical measures should be evaluated with caution Kugel questions

two reported cases of "successful" unilateral renal decapsulation [25] In these instances, decapsulation anteceded diuresis by several days Diuresis occurred on the eleventh and twelfth days, when spontaneous diuresis may be anticipated

A recent case report concerns itself with a patient who ingested a large dose of mercury with subsequent anuria [28] On the fourth day of anuria following the administration of large volumes of intravenous fluids, peritoneal lavage was started Prolongation of life, despite peritonitis and generalized edema, is ascribed to peritoneal lavage Here too, it is questionable how much prolongation of life can be attributed to the peritoneal lavage which was started in the "prediuretic phase" of the anuria [25] Each of the measures available at the present time, including artificial kidney, intestinal loop perfusions, and peritoneal lavage, has inherent difficulties and dangers [29 30] We feel that these mechanical measures should be initiated only after an adequate period for spontaneous recovery has been permitted and that the need for them will often be obviated by judicious administration of fluids and careful attention to preservation of the normal electrolyte pattern

Summary

A case of acute mercurial intoxication is used to illustrate the principles that have been found effective in aiding the recovery from reversible anuria The tendency to spontaneous resolution of the anuria is stressed as well as the anticipated time of its occurrence Because of the reversible nature of the kidney lesions, caution is advised in interpreting the efficacy of advocated mechanical means in the treatment of anuria

Addendum

Since the preparation of this paper, we have successfully managed another case of anuria due to bichloride of mercury intoxication

Case 2 —The patient, a 28-year-old Puerto Rican woman, attempt to induce an abortion by vaginal introduction of 2 5 Gm of bichloride of mercury in tablet form on January 21, 1948 She was transferred to the Mount Sinai Hospital on January 26, 1948, on the fifth day of anuria with symptoms of severe ulcerative vaginitis, stomatitis, and colitis She was treated with the Kolff artificial kidney for six hours shortly after admission There was a drop in the blood urea nitrogen from 110 mg per cent to 31 mg per cent at the end of six hours The blood creatinine, uric acid, and phosphorous levels fell from abnormally elevated to normal levels However, the anuria persisted, and azotemia again became progressive On February 4 the blood urea nitrogen had reached 115 mg per cent, but the serum chlorides and carbon dioxide combining power were maintained within normal limits by means of oral administration of sodium chloride and sodium bicarbonate Only minimal edema was noted during the entire illness Twenty cubic centimeters of urine was obtained on the eighth day following the onset of anuria, and by the twelfth day the urinary output had increased to 1,200 cc in twenty-four hours Since then, the patient has continued to void large volumes of urine, up to 5,000 cc daily, with specific gravity ranging from 1 010 to 1 012 The blood chemistries, including urea nitrogen, creatinine, uric acid, phosphorous, calcium, carbon dioxide combining power, were all normal

The specific role of the artificial kidney in this instance will be discussed in a future publication Resolution of anuria and oliguria occurred approximately seven days after the artificial kidney had been applied In this instance, recovery of the patient may be attributed to the use of the Kolff artificial kidney and to the meticulous care in controlling the fluid and electrolyte balance

References

1 Lucké B Mil Surgeon 99 371 (1946)
2 Kolff W J New Ways of Treating Uremia 1st ed London J & A. Churchill 1947 p 55
3 Blalock A and Beard J W J Clin Investigation 11 311 (1932)
4 Peters J P Eisenman A. J , and Kydd D M Am. J M Sc 185 149 (1933)
5 Rosenthal S M Pub Health Rep 48 1543 (1933)
6 Monte L A and Hull E J.A.M A 114 1433 (1940)
7 Sollmann T and Schreiber N E Arch Int. Med 57 46 (1936)
8 Goodman, L and Gilman, A. The Pharmacological Basis of Therapeutics 1st ed New York Macmillan Co , 1941 p 733
9 Hull E and Monte L A. South M J 27 918 (1934)
10 Burwell E L , Kinney T D and Finch C A New England J Med 237 657 (1947)
11 Bell, E T Renal Diseases 1st ed , Philadelphia Lea & Febiger 1946 p 256
12 Gilman A Allen R. P Philips F S and St John E J Clin Investigation 25 549 (1946)
13 Longcope W T and Luetscher J A., Jr *ibid* 25 557 (1946)
14 Earle, D P Jr and Berliner R. W Am. J Physiol 151 215 (1947)
15 Lambert, S W , and Patterson, H. S Arch. Int. Med 16 865 (1915)
16 Rosenbloom J Am. J M Sc. 157 348 (1919)
17 Campbell W R. Arch Int. Med 20 919 (1917)
18. Mosenthal H. O *ibid* 14 844 (1914)
19 Butler A. M and Talbot, N B New England J Med 231 585 621 (1944)
20 McCance R. A. Lancet 1 823 (1936)
21 *Ibid* 1 704 (1936)
22 Peters J P and Van Slyke D D Quantitative Clinical Chemistry 2nd ed Baltimore Williams & Wilkins Co 1946 p 705
23 Looney, J M J Biol. Chem. 70 513 (1926)
24 Fishberg A M Hypertension and Nephritis, 4th ed Philadelphia Lea & Febiger 1939 p 361
25 Kugel V H. Am. J Med. 3 188 (1947)
26 Wolpaw R. and Adlers N J Lab & Clin. Med 27 1387 (1942)
27 Burnett C H. Am. Pract. 2 8 (1947)
28. Goodyear W E and Beard D E. J A.M A 133 1208 (1947)
29 Frank, H. A Seligman A. M and Fine T *ibid* 130 703 (1946)
30 Bassett S H Brown H R. Keutmann E H , Holler, J Van Alstine H E , Mocejunas O , and Schantz, H. Arch Int. Med. 80 616 (1947)

ACUTE URINARY INFECTIONS IN INFANTS AND CHILDREN

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ACUTE urinary infection in infants and children is of sufficiently high incidence and potential gravity to merit serious clinical consideration despite increased pediatric acuity and our newer chemotherapeutic agents The mortality of acute renal infection in infants is approximately 3 per cent, becoming less in older children In this communication will be considered the pathogenesis and treatment of the usual nontuberculous renal infections as well as complicating surgical renal conditions which may seriously endanger the life of the patient and increase the therapeutic difficulties In urinary infection renal involvement must always be considered to exist until proved otherwise and merits the prime consideration

Pathogenesis of Renal Infection

Commonly, all urinary infections in children have been loosely, and pathologically inaccurately, designated as pyelitis. The usual renal lesion in these cases is an interstitial suppurative nephritis and involvement of the kidney pelvis may be clinically disregarded

The hematogenous route is the usual one in bacterial invasion of the kidney Doubtless in some instances and particularly where there is lower urinary tract infection and obstruction, retrograde or ascending renal infection by vesicoureteral reflux occurs Lymphatic bacterial spread to the kidney is generally lymphohematogenous from an infected lower urinary tract or other focus The regional lymphatic drainage transmits the absorbed bacteria to the lymphatic (thoracic) duct, and thence it is transported to the circulating blood

Bacteriology—The older pediatric texts taught that over 90 per cent of urinary infections in children result from colon bacillus invasion but modern bacteriologic studies of properly collected specimens suggest that not more than half these infections are due to gram negative bacilli and of these organisms many are not Escherichia coli, E communis, or E. communior but are Bacillus proteus, B pyocyaneus, B aerobacter and other rarer forms Gram positive cocci comprise nearly all the remainder of these infections, and of these, Staphylococcus aureus has been of highest incidence in my experience with various forms of streptococcus, including S fecalis appearing in about a fourth of the cases In half of all cases of renal infection the bacterial involvement is mixed and colon bacilli are present in about a half of these The primary source of the gram negative bacilli is the intestinal tract Gram positive cocci frequently appear in the urine coincident with or following acute upper respiratory infections, particularly of the acute sore throat variety Dental foci do not have the causative importance that they so often have in urinary infection in adults

Predisposing Factors—Urinary obstruction is the commonest predisposing factor in the genesis of urinary infection In children nearly all of these obstructive lesions are congenital These obstructions range from congenital stenosis of the prepuce and meatus to stricture of a renal calyx. The urinary tract structures above the point of obstruction are congested by urinary back pressure, and their local resistance is correspondingly diminished As the obstruction persists and increases, urinary stagnation or constipation likewise increases as does renal damage

As a therapeutic corollary the establishment of free urinary drainage is of prime importance, despite the fact that today with the employment of mandelic acid, sulfonamide, penicillin, or streptomycin according to bacteriologic indication, we are able to sterilize the urine in most cases although there exists unrecognized or untreated urinary obstruction Therefore, even though the urine can be sterilized in these cases by modern chemotherapy, these patients should not be discharged as cured without at least an excretory urographic study to demonstrate that the upper urinary tract is morphologically normal Successful sterilization of the urine by methenamine warrants the assumption that no important obstruction exists but this does not hold with present-day chemotherapy

The hematogenous bacterial invasion may localize in the glomerulus the afferent vessels or more particularly in the efferent vessels which pass from the glomerulus to course in the interstitial spaces between the renal tubules as nutrients of these structures With mild bacterial embolism or good tissue resistance of the host the infection process is neither clinically evident nor is there perceptible scarring on healing But with increased virulence of the bacteria or more massive emboli the inflammatory lesion in the interstitial spaces is correspondingly greater

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and more severe There is also pronounced perivascular leukocytic reaction with cloudy swelling of the epithelial cells lining the adjacent collecting tubules As this process becomes more advanced, in serial section we can see leukocytes extruding their way between the swollen epithelial cells into the lumen of the tubule These leukocytes constitute the bulk of the pus found in the urine and, with severe interstitial suppuration, irruption of minute interstitial perivascular abscesses occurs with the passage of large amounts of purulent debris into the collecting tubules and thence to the bladder

It is this interstitial suppurative lesion in the renal parenchyma which creates the grave clinical and therapeutic problem in these cases, for, with complicating obstruction peripherally or with usually severe bacterial invasion, the entire kidney may be converted to a grossly purulent structure Large amounts of functioning secretory tissue are thereby destroyed, and the remaining tissue is functionally handicapped by massive generalized scarring consequent to the healing process In some cases the suppurative process advances to pyonephrosis and, when unilateral, nephrectomy is required

Healing of these badly damaged kidneys brings about stricturization of collecting renal tubules within the parenchyma itself, which interferes with free urinary drainage and healing of the subtendent lesions Perpetuation of the infectious process results This explains the therapeutic failure in many cases of bacteriocide-resistant renal infections Moreover, the resulting sclerotic process explains the picture of chronic interstitial nephritis subsequently observed in so many of these cases This is not to infer that this is the genesis of all cases of interstitial nephritis, but certainly there is evidence to indicate that bacterial invasion is a frequent factor

Clinical Considerations and Diagnosis

The clinical picture of acute urinary infection is so well known as to merit no description here Infants and the very young are in general more seriously ill, toxic, and prostrated than are older children Frequently and because of the clinical picture, the diagnosis of grippe satisfies the physician until outstanding manifestations of urinary tract involvement appear, or perchance the laboratory reports pus in the urine It is notable that in half the cases of renal infection, vesical and other localizing symptoms are absent There may be pain over one or both kidneys, hematuria, or frequency of urination As a rule the renal involvement is bilateral A shaking chill in a young child usually means acute pyelonephritis

Urinalysis of a properly collected specimen should be part of complete physical examination of any patient and is demanded as part of the examination of every sick child This implies catheterization in females of all ages, and also of males when collection of a voided specimen is uncertain or impossible In the male, with the prepuce retracted, the glans and separated meatus are well washed with an antiseptic solution such as oxycyanide of mercury 1 500 The child is asked to void and, after a small amount has been passed, a sterile receptacle is introduced into the stream for collection of the specimen for routine urinalysis and bacteriologic culture Unless these precautions are observed, urinary contamination by genital debris in each sex is likely and bacteriologic studies are both valueless and misleading Similarly, collected specimens are utilized for test of cure, no patient should be discharged as cured until at least two properly collected specimens have been proved sterile by culture

Examination of the urine for pus should be made upon a freshly voided uncentrifuged specimen, and more than three to five leukocytes below power field are abnormal We are not interested in whether the pus is clumped or is found as single cells, but we must be certain that these cells are true leukocytes by demonstration of the polymorphonuclear or "pawnbroker's" nucleus Too often desquamated epithelial and other detritus is reported as pus The presence of pus-casts in the urine at once establishes the diagnosis of pyelonephritis Examination of uncentrifuged specimens obviates inaccuracies concerned with the time and speed of centrifuging For quick identification of the invading bacteria, the sediment of a centrifuged specimen is gram-stained, and this will indicate whether the infection is gram-negative bacillary, gram-positive coccal, or mixed Moreover, this will at once suggest the correct choice of chemotherapy according to bacteriologic indication For example, in bacillary infections penicillin is useless (Table 1)

Most acute urinary infections in children are spontaneously cured clinically in two or three weeks with disappearance of fever, gastrointestinal disturbances, and/or urinary symptoms Yet in such cases bacteriologically examined six months later, positive urine cultures will be found in over half, indicating that the child is clinically well but not bacteriologically cured With physical debilitation or the acquisition of acute infection elsewhere, exacerbation of the smoldering, unsuspected, persistent urinary infection is almost certain to occur This is usually designated as "recurrent pyelitis" Such a clinical history practically always denotes

TABLE I.—CHEMOTHERAPY IN ACUTE URINARY INFECTIONS

Dose (4-hr average)	Mandelic Acid* (Ammonium or Calcium Salt) (Gm.)	Sulfonamide* ** (Gm.)	Penicillin† (Units)	Streptomycin† (Units) (Gm.)
Under 2 years	2–4	0.5–1.0	50,000	500,000 0.5
2 to 4 years	4–6	1.0–1.5	100,000	750,000 0.7
5 to 8 years	6–8	1.5–2.0	250,000	1,000,000 1.0
8 to 12 years	8–12	2.0–3.5	500,000	1,500,000 1.5
Adults	12–15	3.0–5.0	500,000–1,000,000	2,000,000 2.0
Bacteriologic indication	E. coli group Communis Communior Freundii Aerobacter group Aerogenes Cloacae Pyocyaneus (pseudomonas) Proteus vulgaris*	E. coli group Communis Communior Freundii Aerobacter group Aerogenes Cloacae Pyocyaneus (pseudomonas) Proteus vulgaris*		E. coli group Aerobacter group P. vulgaris Pyocyaneus
Gram-positive cocci	Staphylococcus Streptococcus B. fecalis (enterococcus)	Staphylococcus Streptococcus	Staphylococcus Streptococcus Hemolytic Anaerobic Gonococcus	May inhibit, but penicillin preferred
Ineffective against	* B. proteus (unless urine highly acid)	Enterococcus (B. fecalis)	Gram-negative bacilli	
Urine reaction‡	Must be more acid than pH 5.5. Mandelic acid concentration greater than 0.5 per cent Ammonium chloride Calcium chloride Ammonium citrate Dilute HCl q.s.	Preferably alkaline. Combining terms of sodium bicarbonate or potassium citrate q.s.		

* Oral 5 to 8 days.
** Sulfathiazole preferred for gram-positive cocci. Sulfadiazine preferred for gram-positive bacilli.
† Intramuscular 4 to 6 days.
‡ Best estimation by potentiometer or nitrazine paper or solution.

urinary stasis due to obstruction or unrecognized neuromuscular disease and of itself demands complete urologic examination to determine why the infection recurred.

Treatment

The acutely ill patient is given the usual sick-room attention with quiet and rest. It is important that free bowel elimination be instituted promptly by enema, laxation or colonic irrigation. An increased fluid intake is indicated. Examination of the properly collected gram-stained urine sediment will disclose the type of bacterial invasion, and therapy, as indicated in Table 1, is instituted at once. Intensive chemotherapy for five or six days is usually adequate, and generally during this time the child will return apparently to normal. A re-examination of the urine will then show whether bacteria are still present and, if none are found, a culture of the urine is made three to four days later. Cultures made during or promptly at the cessation of chemotherapy are likely to be falsely negative, but cultures made after three or four days will disclose surviving bacteria. If the culture is sterile another should be taken in two to four weeks and if this is likewise sterile the child may be considered cured.

If the child is not cured the chemotherapeutic course should be repeated, often employing another drug known to be effective against the demonstrated bacteria. For example mandelic acid and sulfonamide compounds may, for the most part, be used interchangeably. Penicillin is of no value in gram negative bacillary infections whereas streptomycin is often curative although it is less effective than penicillin against most gram positive coccal infections.

Persistent Acute Urinary Infection

When acute urinary infection remains so for four to six days and shows no response to intensive medical therapy a complete urologic examination is indicated irrespective of the age sex and condition of the patient. At the very least, an excretory urographic study should be made. This may be unsatisfactory because of conflicting gas shadows consequent to toxemia or to immobilization of the patient in bed. This study often gives a suggestive clue especially when it demonstrates obstruction in the upper urinary tract or there is evidence of good renal function on one side with little or none on the other. Cystoscopy ureteral catheterization divided renal function tests, and retrograde pyelography should complete the examination.

It is notable that investigation in practically every child, examined because of the criteria given here will disclose a surgical lesion of the kidney usually unilateral. In my experience the commonest condition found under such circumstances has been acute infected hydronephrosis with congenital stricture at the ureteropelvic junction. Extensive interstitial suppurative involvement adds to the kidney damage and the grave clinical picture. In such cases the

institution of temporary renal drainage by indwelling catheter in the kidney pelvis will usually tide over the patient until chemotherapy will effectively control the infection

Unfortunately not all patients with severe complicated renal infection will respond favorably to conservative treatment Usually in these cases, and when the general condition of the child permits, the indicated surgical intervention must be carried out This means nephrostomy if it seems likely that the kidney can be preserved by ureteropelvioplasty, either at the time or subsequently If the kidney is hopelessly injured or the grave condition of the child demands, employ prompt nephrectomy

In some cases in which the clinical picture is that of persistent hyperacute renal infection, surgical exploration reveals massive focal suppurative nephritis with the kidney riddled from pole to pole with small and large abscesses Frequently there is secondary perinephritic abscess Here nephrectomy is necessary and, if indicated, drainage of perirenal abscess This assumes that the other kidney has been demonstrated competent to sustain life

Renal carbuncle, so-called because of its gross appearance, is a metastatic renal infection predominantly due to S aureus and is usually unilateral Secondary perinephritic abscess is common, and the clinical picture generally causes the diagnosis of "acute pyelitis" to be made The probable diagnosis is made by urologic examination, and, unless simple renal decapsulation and removal of the carbuncle core appear likely to be curative, employ nephrectomy

Occasionally, both kidneys are involved, here the outcome in the past has usually been fatal, despite decapsulation, renal drainage, and intensive chemotherapy of the time Yet there is reason to believe that liberal administration of the antibiotics in particular will prove of inestimable value in the clinical control of some of these advanced destructive suppurative surgical renal lesions In short, "acute pyelitis" is decidedly something more than an inflammation of the pelvis of the kidney and should be so regarded by those entrusted with the care of the young Parenthetically, this problem is not greatly different in adults and children, it is only the young patients themselves who are different

Summary

In urinary infection, the kidneys must always be assumed to be involved until proved otherwise

Urinary infection is a common disease in infants and children, is often grave, and involves a definite mortality, particularly in infants

The important lesion in so-called acute pyelitis is generally an interstitial suppurative nephritis, and the bulk of the pus found in the urine in these cases originates in the interstitial suppurative lesions in the renal parenchyma This process may cause wide architectural destructive changes in the kidney, and many tubular units may be functionally endangered or lost by sclerotic healing

It is believed that acute renal infection and resulting sclerotic healing is the pathogenic basis in many cases later recognized as chronic interstitial nephritis

Early diagnosis is of utmost importance in acute renal infection, and urinalysis of a properly collected specimen is the keystone of the diagnostic arch Pus in the urine should be identified as polymorphonuclear leukocytes The nature of the invading bacteria is determined by gram stain of centrifuged sediment and by culture

Persistent "acute pyelitis" is an outstanding indication for prompt complete urologic investigation, which will almost always disclose a surgical complication of the renal infection demanding operative intervention with renal drainage or nephrectomy

Chemotherapy relies on the generous administration of mandelic acid preparations, sulfonamide compounds, and, probably best today, of the antibiotics penicillin and streptomycin

Only by close cooperation between physicians entrusted with the care of the young and their urologic colleagues can these children with complicated urinary infection be given the best prospect of survival and cure

No patient with urinary infection should be discharged as cured until the urine has been proved sterile by bacteriologic examination of properly collected specimens

140 East 54th Street

The patch test will miss an appreciable number of persons with significant tuberculous disease —*Exchange*

At the present progressive rate, the lung may become the most frequent site of cancer in men — *Exchange*

Case Reports

FATAL HEMORRHAGE IN BOECK S SARCOID

ARTHUR A FISCHL, M D , F A C P and KARL FREIRICH M D , New York City

(From the Medical Service of Queens General Hospital)

IN 1889 Besnier described peculiar lesions of the fingers, nose, and ears which he called lupus pernio [1] The sarcoidosis of Boeck described ten years later consisted of similar lesions of the skin plus lesions of the lymph nodes and mucous membranes [2] In 1914 Schaumann recognized the fact that the lesions reported first by Besnier and later by Boeck were manifestations of the same disease [3] He called it lymphogranuloma benignum in distinction from Hodgkin s disease or lymphogranuloma malignum. The characteristic lung and bone lesions were described by Kuznitsky and Bittorf and by Jüngling [4 5] As scientific knowledge progressed the many features of the disease less apparent to the eye came to be recognized as part of the syndrome It was obvious that sarcoidosis was a systemic disease wherein the structures that were particularly involved manifested themselves most conspicuously It was also apparent that the disease was much more common than was originally supposed

During the past two decades partly due to the speculation that arose as to whether, etiologically this disease was in some way related to tuberculosis or whether it was actually an unusual form of tuberculosis (the so-called noncaseating type), and partly due to the tremendously more widespread use of the chest x ray sarcoidosis of Boeck has aroused the interest of internists pathologists and tuberculosis clinicians A good deal has been written on this subject. In reviewing the literature of the past twenty years and particularly of the past decade one finds that innumerable reports have been published These include series of cases and single case reports dealing with the etiologic pathologic and clinical features of this disease The symptomatology has been very adequately covered

Hemoptysis in Boeck's sarcoid is an extremely unusual symptom There are only two reports of such cases in the entire literature. The reference to the hemoptysis is only casual, implying that the bleeding was of minor significance. Rubin and Pinner recently published a review of 26 cases of Boeck s sarcoid which came to autopsy [6] Included in the review is a detailed clinical history of each case. In none of these cases is hemoptysis mentioned as a symptom Longcope and Pierson described eight cases in detail and did not mention hemoptysis occurring on one occasion [7] Longcope and Fisher, in case three of their series described a single episode of bloody expectoration [8] In a personal communication Dr I Snapper stated that in the absence of a tuberculous cavity he had never seen hemoptysis in sarcoid disease [9]

There is no report in the literature of a fatal hemorrhage occurring in this disease. The authors feel that since a caseating cavernous lesion of the lung was absent this case study is worthy of report

Case Report

The patient, G S was a 24-year-old white woman who was admitted to the medical wards of Queens General Hospital on August 3 1946 because of hemoptysis. Her family history was noncontributory Her past history revealed that in 1937 a routine chest x-ray was taken before college entrance. The presence of hilar adenopathy was reported then. She was sent to a sanatorium where she was told that she had infiltration in the apex of her left lung She remained there for six months, during which time she raised minimal amounts of sputum. Examination of all sputum specimens for acid-fast bacilli was negative.

After discharge from the sanatorium she returned to college and did well for a while but then found it necessary to cease her studies because the work was too fatiguing Her chief complaint at this time was dyspnea She was married in 1942

In May 1945 fifteen months before her present admission she had an episode of hemoptysis raising about one and one-half cupfuls of blood while at work The following fall she had another episode of hemoptysis and developed pneumonia following it She again spent six months in a sanatorium during which time all her sputa were negative for acid-fast bacilli and tuberculin skin tests were negative.

In May of 1946 she was seen by a private physician who gave her five radiation therapy treatments to her chest One week before admission she had another episode of hemoptysis continued to have blood-streaked sputum and then had still another episode of hemoptysis the day of admission to the Queens General Hospital

The significant physical findings on admission were as follows pallor and rapid respirations, temperature 102 4 F pulse 140 blood pressure 90/60 The eyes showed nystagmus on lateral gaze to the right There were palpable, discrete nontender axillary lymph nodes and a few small shotty inguinal nodes bilaterally The lungs revealed dullness on percussion over the superior mediastinum both to the right and left and dullness in the right chest posteriorly Numerous rales and rhonchi were heard over the mediastinum and

trachea anteriorly and posteriorly There were moist expiratory rales at the right base posteriorly and in the right axilla. The fingers were clubbed The remainder of the physical examination revealed normal findings

Course—The patient was bronchoscoped soon after admission The trachea and major bronchi were filled with blood, but no bleeding point could be found She was given penicillin, 50,000 units every three hours intramuscularly A transfusion of 350 cc of whole blood was given on the day of admission and caused a mild reaction On August 9, at 2 00 P M she had another hemorrhage She received 500 cc of whole blood with no reaction The next day she appeared slightly improved, but on the following day, August 11, she had another pulmonary hemorrhage She received another transfusion early on the morning of August 12 At 3 35 A M of this day she had another hemorrhage which proved fatal

The pertinent laboratory data revealed a blood count of 3,500,000 red blood cells and a hemoglobin of 12 5 Gm The white blood count was 31,000 The sedimentation rate was 54 mm in one hour The albumin-globulin ratio was reversed, the albumin being 2 3 and the globulin 3 7 per 100 cc.

Autopsy—The postmortem examination revealed a pale, well-developed, well-nourished white woman with evidence of nasal and oral hemorrhage superficially The chest cavity was obliterated by numerous fresh adhesions The trachea was deviated to the right The main bronchial walls were markedly dilated and thickened There were numerous areas of aspirated bloody mucus within the bronchioles The dilatation and thickening of the bronchial tree were most marked in the upper lobes of both lungs and were associated with fibrosis of the interstitial tissues The bronchial dilatation also involved the lower lobes, but to a lesser extent

The lungs were quite firm, particularly in the uppermost portions, were hypocrepitant, and cut with increased resistance They were pinkish-gray in color with no congestion, edema, or infarction evident The left lung was markedly atelectatic and the right lung correspondingly emphysematous The atelectatic areas involved the left upper lobe and a portion of the left lower lobe There was some questionable collapse of the right upper lobe

The heart was shifted to the left but otherwise normal The mediastinum manifested enlarged nodes particularly at the bifurcation of the trachea The nodes were firm and showed complete replacement of the normal architecture by a pale white, rather homogeneous infiltration of granular tissue The peribronchial nodes showed a similar but not so extensive enlargement The liver and kidneys were normal, but the spleen presented numerous, small, white, discrete areas measuring 1 to 3 mm in diameter These nodules were rather granular, isolated, and showed no tendency toward confluence The remainder of the organs were normal

The microscopic examination was done by Dr Alfred Angrist The lungs showed considerable diffuse fibrosis containing giant cells with some of the alveoli filled with monocytic and occasional epithelioid and giant cells Some smaller bronchi were dilated and filled with mucus Other sections showed marked bronchiectatic dilatation with regional inflammation of a nonspecific character with plasma cells predominating The vessels were rather thick walled with prominent fibrosis Some sections showed considerable atelectasis with rather diffuse epithelioid exudation and polymorphonuclear formation The septal tissues of the lung were markedly thickened Epithelialization of alveoli was prominent, particularly beneath the pleura Definite organizing pneumonitis was present in several sections (Figs 1–3)

The lymph nodes showed marked hyalin fibrosis and multiple areas of epithelioid tubercle, some being transformed to laminated hyalin fibrotic nodules In some instances the lymph nodes were almost completely hyalinized, other nodes showed an abundance of epithelioid tubercle structure both as isolated tubercle and in the form of masses Many of the epithelioid tubercles showed reticular fibrosis In the sinus zones, occasional masses of epithelioid cells and isolated giant cells were seen



FIG 1 Section of lung showing characteristic features of Boeck's sarcoid Note tubercle at upper margin



FIG 2 Magnification of Fig 1



FIG 3 *Diffuse fibrosis containing giant cells with some alveoli filled with epithelioid cells and organizing pneumonitis.*

The spleen showed diffuse congestion with the follicles persisting and some epithelioid tubercles and giant cells present. The kidney, thyroid, liver heart bone marrow and breast were not remarkable

Comment

Fatal hemorrhage in a patient with sarcoid disease of the lung must be extremely unusual. The literature was searched, and no report, with autopsy findings, of massive hemoptysis due to this disease was discovered It would not be unusual for a patient with sarcoidosis to have a fatal hemorrhage. Providing there was coexisting tuberculous disease with cavitation, the hemorrhage would be due to erosion of a large blood vessel. The association of these two diseases in the same patient has been reported. However, in the patient here described there was no evidence of tuberculous disease in the lungs on postmortem examination. Microscopically the exact bleeding point could not be found.

Summary

A fatal case of hemoptysis associated with sarcoidosis is reported This is a most unusual situation, and no previous reports of such an occurrence could be found in the literature.

References

1 Besnier, E. Ann. de dermat. et syph. 10 333 (1889)
2 Boeck, C.: Cutan. Dia. 18: 543 (1899)
3. Schaumann J.: Mémoire presenté a la societe francaise de dermatologie et syphiligraphie pour le Prix Zambaco November 1914.
4. Kurnitsky E. and Bittorf A.: München med. Wchnschr 91 1349 (1915)
5 Jonding, O.: *Fortschr. d. Neurol. Psychiat.* 27 375 (1919 1921)
6. Rubin, E. H. and Pinner M. Am. Rev Tubere. 49 146 (Feb.) 1944
7 Longcope W T. and Pierson, J W.: Bull. Johns Hopkins Hosp. 9 223 (1937)
8 Longcope W T and Fisher A M J Mt. Sinai Hosp. 8 784 (Jan. Feb.) 1942.
9 Snapper I.: Personal communication.

MIX VACCINE-TOXOID SHOTS

Children will get better protection against diphtheria and whooping cough when the materials used for the antidiphtheria and antiwhooping cough shots are combined in one mixture instead of being given separately

Studies showing this are reported by Dr Joseph A Bell of the U.S Public Health Service in a report to the *Journal of the American Medical Association*. The studies were made in Norfolk Virginia, and neighboring territory, beginning in 1941

Children from the ages of two to 23 months were selected for the test and divided at random into two groups. One group was given an alum treated mixture of whooping cough vaccine and diphtheria toxoid. They got two shots of this, four weeks apart

The other group got whooping cough vaccine and diphtheria toxoid in separate injections

Of 407 children who got two doses of the mixed product, 48 got whooping cough Among the 385 who got two doses of the vaccine alone 158 cases of whooping cough occurred

A year after receiving the first injection, 992 children in the diphtheria study were given Schick tests, the standard method of determining immunity to diphtheria. A positive reaction to this test shows susceptibility to diphtheria. There were only one-third as many positive reactions in children who got the mixed product as in those who received unmixed toxoid

The mixed vaccine-toxoid shots are effective in babies as young as two to five months old and side reactions Dr Bell reports, are few and negligible But at least one of the doses, he advises should be given after a child is six months old for best protection.

—*Science News Letter August 7 1948*

DIRECT ABDOMINAL HERNIA

Joseph B Stenbuck, M D , New York City

THE patient whose case is described is one of three patients with the same type of hernia who were presented before the New York Surgical Society on February 25, 1948 They were men of middle age or older who were of similar strong body build with moderately obese abdomens All three gave very similar histories One of the three had bilateral direct abdominal hernias and a right inguinal hernia as well.

Case Report

M S , a man fifty-five years old, was the only one of the three patients operated upon He was admitted to the Mt Sinai Hospital Semi-Private Pavilion, January 19, 1946 He complained of a recurrent swelling of two years duration in the lower left portion of the abdominal wall There was no history of any injury, direct or indirect, which might have affected his abdominal wall He had had no major illnesses

His attention was drawn to the lower left portion of his abdomen by what he called a "squeak" in that region when he voided, even though no more than a normal intra-abdominal pressure was exerted Right after this he felt a lump about two inches in diameter in the same region He was able to reduce the lump digitally into the abdominal cavity The lump, grew larger, but it receded or was reduced easily, reappearing after any activity which increased intra-abdominal pressure The lump reached a size of approximately four inches in diameter Localized cramplike pains were felt at times, but there was no vomiting or constipation

In the region indicated in the diagram, a mushroom-type mass, about four inches in diameter, could be felt when the patient coughed (Fig 1) At the same time, a bruit was felt The mass was easily reduced into the abdominal cavity and then a defect one inch in diameter was felt deep in the abdominal wall. No abnormalities were found in the inguinal canal A diagnosis of direct abdominal hernia was made Examination of the inguinal canal was negative for hernia.

At operation, an oblique four-inch incision was made over the mass in the direction of the fibers of the external oblique muscle When this muscle was brought into view, it was found to be intact, but a mass bulged beneath it. An incision four inches long was made in the external oblique aponeurosis in the

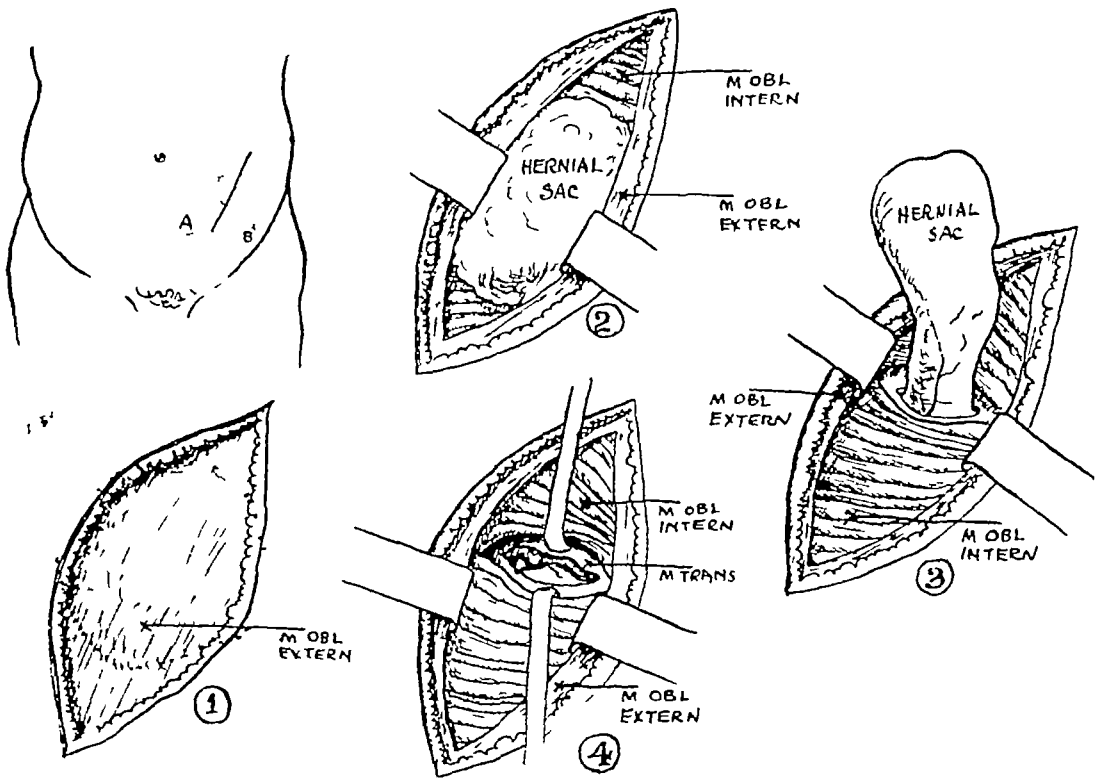


Fig 1 The picture of the lower abdomen shows the position of the hernia and the incision in the abdominal wall

1 The dotted line outlines the hernia beneath the external oblique aponeurosis
2 The external oblique muscle has been incised and the hernia is visible mushroomed beneath it
3 The hernia has been dissected free, and its relation to the fibers of the internal oblique muscle is seen
4 The hernial sac has been ligated and resected, revealing the direct defect it has produced in the transversalis muscle and the internal oblique muscle

direction of its fibers With retraction, the mush roomed mass was brought into view and was easily dissected from the surface of the internal oblique muscle upon which it lay and through the center of which it emerged On retracting the fibers of the internal oblique muscle, the mass was seen to come through a defect muscle about one inch in diameter in the transversalis

The mass proved to be a well-formed sac contain ing a process of omentum. A small artery emerged through the transversalis muscle defect and accom panied the sac.

A high ligation and resection of the sac was done and the layers of the abdominal wall were closed with silk sutures

Comment

It is possible that many hernias of this type may be missed since they do not protrude as hernias do in the inguinal region. Covered as they are by the external oblique aponeurosis they may cause symptoms which are not readily explained. In one case the mass was discovered only after the third visit and examination Examination was repeated because the patient was sure he had felt a lump

Differentiation was made from a Spigelian hernia, which comes through the abdominal wall at the lateral border of the rectus abdominis muscle at the level of the semilunar fold of Douglas In the case reported the hernia was about midway between the lateral border of the rectus abdominis muscle and the uppermost portion of the inguinal ligament The anatomic picture may be simplified by stating that the hernia had formed an opening exactly like the one we produce when we approach the appendix by way of a McBurney incision except for the fact that the external oblique muscle was intact

Two years after operation there was no sign of recurrence and there were no abnormal symptoms.

49 East 90th Street

PRIZE ESSAYS

The Merrit H Cash Prize and the Lucien Howe Prize will be open for competition at the next Annual Meeting of the Medical Society of the State of New York, May 2, 1949, in Buffalo

The Lucien Howe Prize of $100 will be presented for the best original contribution on some branch of surgery, preferably ophthalmology The author need not be a member of the Medical Society of the State of New York.

The Merrit H Cash Prize of $100 will be given to the author of the best original essay on some medical or surgical subject Competition is limited to the members of the Medical Society of the State of New York, who at the time of the competition are residents of New York State

The following conditions must be observed

Essays shall be typewritten or printed with the name of the prize for which the essay is submitted, and the only means of identification of the author shall be a motto or other device The essay shall be accompanied by a sealed envelope having on the outside the same motto or device, and containing the name and address of the writer

If the Committee considers that no essay or contribution is worthy of a prize, it will not be awarded

Any essay that may win a prize automatically becomes the property of the Medical Society of the State of New York 'to be published as it may direct"

All essays must be presented not later than February 1, 1949 and sent to the Chairman of the Committee on Prize Essays of the Medical Society of the State of New York, 292 Madison Avenue, New York 17, New York.

Armitage Whitman, M D *Chairman*
Committee on Prize Essays

INTESTINAL OBSTRUCTION WITH ILEAL PERFORATION SECONDARY TO INGESTED FOREIGN BODY

BERNARD J FICARRA, M D , Brooklyn, New York

(From the Department of Surgery, St Peter's Hospital)

PERSONS of all ages frequently swallow nondigestible materials The usual outcome is for the foreign body to be eliminated rectally without discomfort All types of nondigestible articles pass through the gastrointestinal tract without distress Among the objects which fall into this category are straight pins, open safety pins, nails etc In the management of these cases, conservative treatment has always been the procedure of choice Watchful waiting will often obviate the necessity for a laparotomy

Recently, an emergency operation was performed for an acute small bowel obstruction The findings at operation were so unusual that they are deemed worthy of presentation as a case report

Case Report

The patient was a 60-year-old white housewife who entered the hospital in May, 1947 The significant history commenced two days prior to admission On that day, in the evening, the patient had a dinner consisting of a bacon sandwich and several glasses of beer Fifteen minutes later, she developed pain in the abdomen which she attributed to the ingested food She took a mild cathartic, and several hours later her bowels moved copiously The stool was soft, black, and watery in consistency That night she could not sleep because of recurrent crampike abdominal pain The next morning her abdomen continued to be painful She felt very weak and vomited four or five times in rapid succession Her bowel movement was very scant In view of the persistent pain and vomiting, she entered the hospital that evening This was twenty-four hours following the onset of symptoms

The significant past history concerned an operation twenty years previously She had a total hysterectomy for fibroids and an appendectomy Since that time she had enjoyed good health

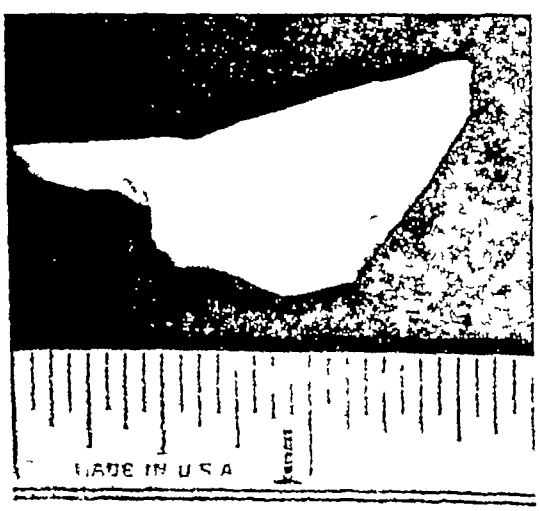


FIG 1 Actual size of bone removed at operation

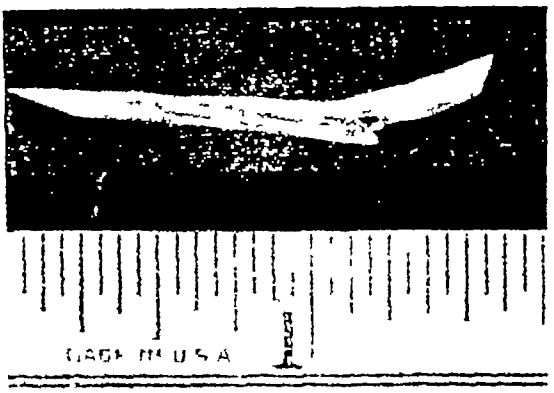


FIG 2 Side view of same specimen, illustrating spearlike character of the bone

Physical examination at the time of admission revealed a moderately obese elderly woman, dehydrated, obviously in pain, appearing acutely ill Her blood pressure was 174/80, pulse 110, respirations 30 The abdomen was very distended with marked tenderness over the midline operative scar Peristalsis was not typical of intestinal obstruction There was tenderness in both lower quadrants Vaginal and rectal examinations were noncontributory The preoperative diagnosis was intestinal obstruction with possible perforation of the intestine

After an adequate preoperative regime, including intubation with a Miller-Abbott tube, intravenous fluids, and plasma transfusions, the patient was subjected to exploratory laparotomy When the peritoneal cavity was entered, a moderate amount of grayish-white pus was encountered Plastic exudate was clearly visible over the small bowel The point of obstruction was a loop of ileum which was transversely adherent to the previous operative scar Another loop of ileum was twisted on itself forming a volvulus An adhesive band across the base of the volvulus compressed the involved segment of ileum This segment of ileum was pregangrenous in appearance but returned to its normal color when the obstruction was released The mesentery itself was moderately edematous The loop of ileum in this vicinity contained a large amount of plastic exudate The small intestine proximal to the obstructed area was moderately distended Approximately one foot from the original point of obstruction, i e , where the ileum was attached to the operative scar, a traumatic perforation through the antimesenteric border of the ileum was found. Through this perforation protruded a hard mass which was found to be a piece of bone (Figs 1 and 2) The sharp end of the bone pierced the ileum and was found protruding into the peritoneal cavity

In order to remove this bone, the traumatic perforation was slightly enlarged The perforation

was closed in two layers, the second layer with interrupted Lembert sutures of black silk The obstruction was eliminated A mixture of sulfathiazole and sulfanilamide was placed into the peritoneal cavity and the abdomen closed in the routine fashion.

The patient had a stormy postoperative course and expired on the second postoperative day

Discussion

The findings at operation in this particular case were not anticipated Interrogation of the patient following operation brought to light the fact that she had eaten chicken four days prior to the onset of her present illness. In view of the fact that she was edentulous she had the habit of swallowing her food without satisfactory mastication It was at this time that she might have swallowed the bone The usual course of events when a person ingests nondigestible material is to pass the object in subsequent bowel evacuations. In this particular case the patient developed a small bowel obstruction which was coincidental to and related to the ingested bone

The increased peristalsis which occurred in an attempt to overcome the obstruction was the precipitating factor in bringing about the traumatic perforation of the small bowel by this foreign body One edge of the bone was knifelike in character and very easily pierced the intestinal wall. If this patient had not developed a small bowel obstruction, she might have passed the object without distress. However the increased peristaltic activity associated with the obstruction resulted in the perforating of the ileum by the bone This perforation caused generalized peritonitis and the patient's eventual death

Summary and Conclusions

1 A case is presented in which an ingested spicule of bone *perforated the ileum producing a* generalized peritonitis This perforation occurred secondary to an acute intestinal obstruction due to postoperative adhesions

2 These findings were demonstrated at the time of operation

3 In spite of the removal of the foreign body the repair of the perforation and release of the obstruction the patient succumbed to generalized peritonitis on the second postoperative day

4 The unusual feature of this case is the occurrence of a traumatic perforation of the ileum secondary to an ingested foreign body (bone) associated with an acute small bowel obstruction

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EARLY CARCINOMA OF THE CERVIX DETECTED BY THE VAGINAL SMEAR

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(From the Gynecological-Cytology Clinic Department of Gynecology the New York Post-Graduate Medical School and Hospital)

ALTHOUGH this case is not unique, it is felt that it is of sufficient importance to be included in the literature at this time when so much interest is being shown throughout the country in the cytologic diagnosis of cancer

Case Report

C. G., aged 46, divorced, para 0 gravida II, presented herself on October 15 1947, complaining of nervousness, tremor, and instability while walking Her menstrual periods had been entirely normal, and there had been no intermenstrual bleeding or discharge. She had lost no weight and there were no symptoms relative to any of the organic systems.

Physical examination was essentially negative. The abdomen was flat, and there were no masses or viscera felt No tenderness was present. The vaginal introitus was nulliparous but marital. The cervix appeared virginal. The uterus was anterior movable, normal in size and of normal consistency except for a small subserous fibroid on the anterior wall of the fundus. A routine vaginal smear was made, chiefly to determine if her symptoms might be explained on the basis of an early menopause.

The smear showed large numbers of cells diagnostic of squamous cell carcinoma. Upon re-examination no evidence of any cervical lesion was seen. She was admitted to the New York Post-Graduate Hospital on November 5 1947 The cervix was biopsied around the clock, and the uterus was curetted Nothing suspicious was noted in the cervix, and a normal amount of endometrium was recovered The pathologic report disclosed an endometrium in the luteal phase and one piece of cervix showed an intramucosal carcinoma The basement membrane was everywhere distinct.

Six days later a panhysterectomy and bilateral salpingo-oophorectomy was done. The pathologic diagnosis was leiomyomata of the uterus, multiple adenomyosis of the uterus normal fallopian tubes, ovaries and appendix and squamous cell carcinoma of the cervix, intramucosal type.

Convalescence was complicated by generalized peritonitis and intestinal obstruction Treatment was by multiple transfusions, intravenous sulfa therapy, penicillin and streptomycin in large amounts and mechanical gastric drainage these measures were successful, and she left the hospital on the eighteenth postoperative day

Discussion

The case is reported not because it is unique but because it is believed that such instances should be brought to the attention of the profession. There was absolutely no reason to suspect malignancy The diagnosis was made by the purely fortuitous circumstance of having taken a vaginal smear It is thought that this neoplasm would have progressed to produce symptoms and signs in the future. The probabilities of cure in this patient are much greater because the tumor was discovered in an early stage

471 PARK AVENUE

Special Article

RESIST BEGINNINGS

JOHN J MASTERSON, M D , Brooklyn, New York

(*President-Elect, Medical Society of the State of New York*)

THERE are sicknesses of communities and nations as well as of individuals We, as medical men, have come to address more attention than before to what we call psychosomatic ills, the effects of emotional strains and conflicts upon the physical condition By whatever name these disturbances may be called, they are all characterized by an inability of persons to get along well with others, which in turn is often a matter of having difficulty in getting along with one's self We need only to pick up the morning newspaper to see what this means in the international scene I believe I can say that today there are in the world more groups of people and more nations who are hating each other than there were before World War II

A prevailing idea today is that it is possible to get something for nothing People, individually and in groups, are more and more inclined to think it smart to over-reach each other, placing the emphasis on giving the least possible for the greatest reward, rather than giving the most possible for the sake of doing good work well We have gone a long way from the time when Grover Cleveland expressed the sense of the majority when he said that "The people support the government, the government does not support the people "

In agitation for compulsory sickness insurance we are in this country again confronted with the danger of collectivism, which is another word for socialism Just before Labor Day, President Truman advocated what he called "national health insurance " I do not need to tell you how damaging such a measure would be to the health of the people What is necessary to emphasize is the need for continuous and uninterrupted opposition to this kind of thinking, which is intellectually dishonest It is dishonest because it promises that the people are going to get something which, in reality, is never going to be delivered It is the first step toward authoritarian government in which the citizen becomes a slave of the state Even if the danger of the passage of such a law is not great, the need to combat this type of thinking remains of first importance, for the more prevalent it becomes, the greater the risk that step by step we shall slip gradually into a national state of mind more and more receptive to ideas which will ultimately mean the abdication of the citizen from control of his own private affairs

We must resist beginnings That is one of the old copy book maxims It was made into a little essay by John Bigelow For seventy years John Bigelow was a public servant, once Minister to France, associated with William Cullen Bryant on the *New York Post*, a man who devoted twenty-five years of his life after 1886 to founding and developing the New York Public Library His career was resurrected to public view in 1947 when Margaret Clapp's biography called *Forgotten First Citizen* won the Pulitzer Prize But, unfortunately, his thinking has not been resurrected In his little book, *Resist Beginnings*, he stated an obvious truth—an invincible and changeless truth—that each divergence from principle weakens our ability to meet the next temptation to do what we think is wrong As he put it, "Every concession changes our relations to everything and to everybody "

It is not enough that we, the medical profession, be aware of the disaster that is at the bottom of the cliff down which we are sliding The people must know it, too, for in this country the voice of the people can still be heard And the people are not going to take our word for it Enemies can say that we are seeking our own advantage We must summon witnesses who have no stake in the outcome, whose opinions are more likely to be considered objective

The most forceful presentation of this sort which I have ever seen is the report of the Brookings Institution recently published with the title, *The Issue of Compulsory Health Insurance*

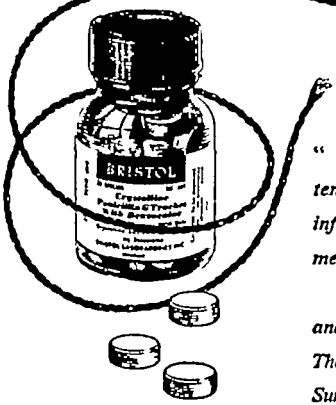
The report reviews the growth of voluntary insurance both for hospitalization and for medical services It notes the recent changes in the amount and distribution of the earnings of the American people, which greatly reduce the number of those who cannot afford adequate medical care if they desire to purchase it Then the report concludes, "It would seem unwise at this time to substitute for these developments a system of compulsory health insurance by national law which would have the unfortunate tendency to freeze policies and eventually retard medical progress "

The crux of the President's proposal is compulsory sickness insurance We all know what this will mean in terms of deteriorated medical care for the public We shall be forced to practice mass medicine, responding to demands on our time which are not part of real medical care, with the resulting loss of self respect When the doctor loses the incentive to do his best for all patients that come to him, something catastrophic happens It has been said that the doctor is at fault who does not do his best for all his patients, no matter how many come to him Is not the doctor subject to fatigue, the same as anyone else? Does not the quality of what he gives his patients depend on the amount of time he can spend in study, in conference with his colleagues? Does it not depend on his keeping his own standards up at all times, which he cannot do when he becomes a link in a mass production line? People who think a doctor can see sixty or eighty patients a day and give each one the best that is in him have no conception of the nature of the practice of medicine

[Continued on page 2410]

The editors of the JOURNAL desire to emphasize the remarks quoted in an editorial in the issue of October 15 1948 by presenting at greater length excerpts from the address by the President-Elect, Dr John J Masterson at the Third District Branch annual meeting September 23 1948, at Schoharie

A STITCH IN TIME



" *The prophylactic use of penicillin tends to reduce postoperative inflammation of the oral mucous membrane and the incidence of infection There is less postoperative pain and healing is more rapid* " *Faier, A.D The Prophylactic Use of Penicillin in Dental Surgery Dental Digest, 153 336 July, 1947*

For either prophylactic or therapeutic purposes Bristol CRYSTALLINE PENICILLIN G TROCHES with Benzocaine provide an efficient means for controlling intraoral infections due to penicillin sensitive organisms Inserted into the buccal sulcus, the troche dissolves slowly, directly bath ing all accessible mucous membranes with an effective and prolonged concentration of penicillin In the presence of painful inflammatory or traumatic mouth lesions the local anesthetic effect of benzocaine will be found especially desirable

Each pleasantly flavored troche contains 5000 units of Crystalline Sodium Penicillin G, and Benzocaine 5 milligrams They are available from your usual source of supply in bottles of 20

Bristol

Crystalline Penicillin G Troches

with Benzocaine

Bristol
LABORATORIES INC.
SYRACUSE NEW YORK

[Continued from page 2408]

The public should know that it is not wise to act on such a proposal when the individuals who are expected to carry it out say it cannot be done The medical profession, which itself is charged with the responsibility for the health of the public, must make clear that under compulsory insurance patients are not going to get medical care as they know it today, but a brushoff

We must battle every inch of the way which leads to compulsion of the state over the individual We are to be robbed of our rights under the guise of extending our rights

We must resist beginnings We must examine with skepticism the gifts which the Greeks are bearing to us, to determine the nature of the specific poison with which they are inoculated We must awaken the patriotism of the American people to the fact that along this way lies the destruction of everything that we have cherished and defended Either we are going on to the socialized state and then to the authoritarian state, or we must stop right where we are now

URINE SEDIMENT IN PREGNANCY

A vaginal smear test for pregnancy was advocated as long ago as 1925 [1] The marked cyclic changes in form and glycogen content of the cells lining the vagina and uterus, and the possibilities of experimental reproduction of the female cycle through various endocrine treatments has maintained interest in the subject In the past few years studies on cancer diagnosis from vaginal smears have been numerous and the hope of early diagnosis of pregnancy also by smear examination continues The technic of study of the morphology of genital smears in cancer and during pregnancy requires special training

Papanicolaou has recently suggested an improvement in pregnancy diagnosis by the preparation of smears from urine sediment instead of from the cells discharged into the vagina [2] The urinary tract lining has its own characteristic changes in pregnancy Smears of the urinary sediment, Papanicolaou says, give a rather uniform cell appearance, convenient for study The effects of estrogens are clear upon urinary sediment, and he reports a characteristic cell of pregnancy, upon which further studies will be made It is not sufficiently clear cut early in pregnancy to displace the usual animal tests for ovarian stimulation, the Aschheim-Zondek and Friedmann tests, but it is informative

Simplification of the technic of pregnancy diagnosis, resting as it does upon an increasingly broad understanding of the hormonal mechanism of normal and abnormal pregnancy, will be a boon to clinical practice and will greatly advance diagnosis of early disease With so much activity and interest in this field, rapid progress in technic is inevitable — *Southern Medical Journal, July, 1948*

1 Papanicolaou G N Proc Soc Exper Biol & Med 22 436 (1925)
2 Ibid *Idem* 67 247 (Feb) 1948

A NEW TROJAN HORSE

The antivivisectionists have used practically every dodge known to the deceiver

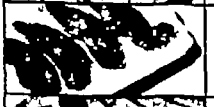
The newest is a Trojan horse known as the *National Pet Protection Patrol* This is a "nation-wide organization to help boys and girls learn how to care for their own pets and to protect dogs, cats, and other animals from all forms of cruelty," according to the Chicago *Herald American*

This organization is opened at no cost to all children six years of age or over A chapter organized in September, 1947, is said to have acquired 3,800 members in the public schools of Los Angeles in less than one year

The organization offers the usual bait to children by giving them free an engraved badge and an official membership card, thus creating a nation-wide organization of youthful Don Winslows on the prowl against cruelty to animals

On the surface no sane person with any tenderness in his heart for animals could object to this beautiful and idealistic purpose Only the cynic who looks beneath the surface would find the occupants of this Trojan horse and recognize them for what they are James H Crukshank, George R Farnum, Mrs Ehot Tuckerman, Ernest Weidhaas, and Verna Hayward of Los Angeles are all prominent in antivivisection movements This is an insidious example of penetration into public schools by special pleaders The success of this movement could mean the indoctrination of millions of school children with ideas contrary to the principles of scientific research, particularly in the fields of biology and medicine Unless school officials are warned, they might see little reason to question the desirability of education stressing kindness to animals Physicians and medical societies everywhere should call this menace to the attention of the schools—*Secretary's Letter, A M A , August 30, 1948*

The Abundant Nutrient Values of MEAT

KIND OF MEAT	COMPLETE PROTEIN	B VITAMINS			FOOD IRON
		THIAMINE (B_1)	RIBOFLAVIN (B_2)	NIACIN	
 PORK	EXCELLENT	EXCELLENT	FAIR	EXCELLENT	EXCELLENT
 BEEF	EXCELLENT	FAIR	EXCELLENT	EXCELLENT	EXCELLENT
 LAMB	EXCELLENT	FAIR	GOOD	EXCELLENT	EXCELLENT
 VEAL	EXCELLENT	GOOD	GOOD	EXCELLENT	EXCELLENT
 VARIETY MEATS (LIVER, HEART, KIDNEY)	EXCELLENT	EXCELLENT	EXCELLENT	EXCELLENT	EXCELLENT
 SAUSAGE (FRANKFURTERS, BOLOGNA)	EXCELLENT	GOOD	GOOD	GOOD	EXCELLENT

ALL VALUES ARE BASED ON COOKED MEATS . . . MEAT ALSO SUPPLIES SIGNIFICANT AMOUNTS OF COPPER AND PHOSPHORUS

While its high content of biologically complete protein ranks meat among man s best protein sources, its contribution of many more indispensable nutrients further enhances its over all desirability in the daily dietary

As is readily seen in the chart above, every kind of meat is an excellent source of high quality protein and of iron Meat further supplies significant amounts of the three B complex vitamins, thiamine riboflavin and niacin Certain cuts and kinds of meat are as a matter of fact, among our richest food sources of thiamine and niacin All meat regardless of grade or cut makes these contributions.

Due to the excellent digestibility of meat—from 96 to 98 per cent—the metabolic availability of its protein and other nutrients is virtually assured making it particularly valuable in many disease conditions in which these nutrients are especially needed.

AMERICAN MEAT INSTITUTE

Main Office Chicago Members Throughout the United States

The Seal of Acceptance denotes that the nutritional statement made in this advertisement are acceptable to the Council on Foods and Nutrition of the American Medical Association.

NECROLOGY

Sidney Jay Furst, M D, of New York City, died on September 9 at the age of sixty-five Dr Furst was a graduate of the College of Physicians and Surgeons, Columbia University, in the year 1908 A staff member of St Elizabeth's Hospital, he was head of the physiotherapy department of Morrisania Hospital He was formerly associated with the Lutheran and Fordham Hospitals and was a member of the William H Luckett Medical Association of the former hospital Dr Furst was a member of the American Medical Association, the American Congress of Physical Medicine, and the New York State and County Medical Societies He was also a past-president and treasurer of the Audubon Medical Society

Nathaniel Read Norton, M D, seventy-seven, died on October 1 Dr Norton had practiced medicine in New York City for more than fifty years when he retired in 1946 Following his graduation from the College of Physicians and Surgeons, Columbia University, in 1894, he served as resident physician at Presbyterian Hospital and the New York Hospital and started his private practice in 1898 From 1904 until 1910, Dr Norton was an instructor at Cornell Medical College and from 1911 to 1921 at the College of Physicians and Surgeons From that time until 1931 he served as clinical professor of diseases of children at the latter school

Dr Norton was attending physician at Babies' Hospital and consulting physician at the New York Orthopedic Hospital and the Northern Westchester and North Country Community Hospitals He was a member of the American Medical Association, the New York Academy of Medicine, the New York Clinical Society, the New York Medical and Surgical Society, the Hospital Graduates' Club, and the New York State and County Medical Societies

John Alfred O'Regan, M D, of New York City, died on October 6 Dr O'Regan was fifty-five years old He obtained his medical degree from McGill University, Montreal, and interned at the Royal Victoria Hospital there and at Bellevue Hospital in New York City During the first World War, he served with the British Army Medical Corps in India and Mesopotamia

In 1922 and 1923 he served as resident house surgeon at the old Lying-in Hospital Since 1932 Dr O'Regan had served as an associate clinical professor of obstetrics and gynecology at the Cornell University Medical College Other posts which Dr O'Regan held include associate in gynecology at the former Skin and Cancer Hospital and membership on the courtesy staff of Booth Memorial Hospital

Dr O'Regan was president of the Lying-in Hospital Alumni Association and a member of the American Medical Association, the New York Academy of Medicine the Society of Alumni of Bellevue Hospital, the New York Obstetrical Society, the Celtic Medical Society, and the New York State and County Medical Societies He was also a diplomate of the American Board of Obstetrics and Gynecology and a fellow of the American College of Surgeons

Rudolph E Pick, M D, of New York City, died on September 21 at the age of sixty-six Dr Pick was graduated from New York University and Bellevue Medical College in 1903 He was a physician on the staff of Metropolitan Hospital and was a member of the American Medical Association and the New York State and County Medical Societies

Carl Pototzky, M D, died in his New York City home on September 21 His age was sixty-eight Dr Pototzky, associate pediatrician of Sea View Hospital, Staten Island, and a former member of Mount Sinai Hospital, was graduated from the University of Breslau in 1903 He came to the United States from his native Germany in 1938, having been forced by the Nazis to give up his position as director of the Guidance Clinic for Nervous and Mentally Retarded Children at Kaiserin Augusta Victoria Hospital in Berlin He had founded the clinic in 1918 and served as director until 1934 Dr Pototzky was a member of the American Medical Association and the New York State and County Medical Societies

Alexander M Stewart, M D, seventy-five, of Naples, died on August 28. Dr Stewart, who retired five years ago, was graduated from Syracuse University College of Medicine in 1903 and immediately started his practice in Atlanta, New York In 1912 he went to Naples, New York, and had practiced there ever since Dr Stewart served as a consultant surgeon on the staff of Frederick Ferris Thompson Hospital, Canandaigua, and was a member of the American Medical Association and the New York State and Ontario County Medical Societies

Stanley Bishop Thomas, M D, of Brooklyn, died on September 6 at the age of seventy Dr Thomas, who was recently made a surgeon-emeritus of the staff of St John's Hospital, Brooklyn, was graduated from McGill University Medical School, Canada, in 1903 and interned at the Presbyterian and Lying-in Hospitals, New York City In World War I he served as a captain in the army Dr Thomas was a member of the surgical staff of St John's Hospital for thirty years and also served on the surgical staffs of Long Island College and Kings County Hospitals He was a founder and past-president of the Flatbush Medical Society, a fellow of the American College of Surgeons, and a member of the American Medical Association, the New York Gastroenterological Society, and the New York State and Kings County Medical Societies

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A palpable supraclavicular node may represent metastasis from either lung or stomach —*Exchange*

Virus pneumonia may cause bronchial dilatation, this may be temporary or permanent —*Exchange*

Case History of an overweight streetcar-operator

'Dexedrine' Sulfate—because it curbed appetite and lowered food intake—enabled even this extremely obese patient to lose weight easily and safely without the use (and risk) of such potentially dangerous drugs as thyroid

Patient before treatment (age 53, height 5' 10½") weighed 352 pounds . was suffering from hypertension, nervousness and dyspnea . . . lived in fear of causing an accident while on duty Overeating was the only demonstrable cause of his obesity

Therapy Dexedrine' (15 mg A C t i d)	Results	Weight	B P	Pulse
March, 1946	'Dexedrine' therapy begun	352	280/152	86
November, 1946	8th month of 'Dexedrine' therapy	269	160/84	86
January, 1948	22nd month of 'Dexedrine' therapy	234	158/84	86

In addition to the weight reduction of 118 pounds and the concurrent lowering of blood pressure, a remarkable improvement is reported in the patient's mood and outlook. Earlier nervousness and fears have vanished

Dexedrine* Sulfate tablets and elixir the most effective drug for control of appetite in weight reduction

Smith Kline & French Laboratories Philadelphia

MEDICAL NEWS

N Y U -Bellevue Center to Expand Its Fellowships

THE regional plan of the New York University-Bellevue Medical Center, in which physicians attached to nonteaching hospitals in suburban and rural communities receive fellowships at the center, will be expanded as a result of the successful first year, it was announced recently

The plan's first annual report said that the program would be expanded from seven to ten hospitals, with hospitals in Connecticut and Delaware joining those in upstate New York, Long Island, and New Jersey in the program

The project is supported by grants from the W K Kellogg Foundation, and 50 hospitals within 150 miles of New York have requested participation, the report said

Under the plan, resident physicians of affiliated hospitals spend an academic year at the medical center participating in basic science studies and subjects applicable to their specialties The hospitals maintain their students, but there are no tuition fees Members of the university's medical faculty visit the hospitals on request for conferences, seminars, and other activities

The seven hospitals who will continue their affiliations next year are Grasslands, Valhalla, New Rochelle, New Rochelle, St Luke's, Newburgh, Flushing, Long Island, Fitkin Memorial, Neptune, New Jersey, Monmouth Memorial, Long Branch, New Jersey North Country Community, Glen Cove, Long Island

Cornell Will Survey Town's Eating Habits

THE town of Groton, termed by Cornell University professors a "typical American community," will serve as a testing ground in a survey of eating habits to be conducted by Cornell's School of Nutrition

Representatives of the School of Nutrition began the selection of 300 families of the Tompkins County Township who will form the nucleus of the survey

Almost all families have preferential menus, Dr L A Maynard, director of the school, says in explaining the survey Some families follow one pattern of eating, some another, and some just eat, apparently without a pattern

Among the things the project should prove, Dr Maynard hopes, are the following

Does a family's educational level, economic level, composition of the family, or availability of food govern what those families eat?

A determination of the type of food used by the average family, how well nourished the families are, what factor determines the type of food used, and the available food supply in the community

A determination of how much food grown locally is consumed by the family, and how much of the family's eatables are actually produced by themselves

Announce Plans for A M A Interim Meeting

REGISTRATIONS and hotel reservations are now being accepted for the second annual Interim Meeting of the American Medical Association at St Louis, November 30 to noon, December 3, 1948

On the eve of the Interim Meeting, Saturday, November 27, the first national Medical Public Relations Conference will be held under sponsorship of the A M A. at the Statler Hotel

Planned to be especially valuable to the general practitioner, the Interim Session will offer lecture meetings, conducted by medical leaders on conditions most often seen in daily practice Subjects to be discussed include diabetes, heart disease, cancer, poliomyelitis, obstetrics, pediatrics, dermatology, genitourinary conditions, hypertension, anesthesia, tuberculosis, jaundice, laboratory diagnosis, x-ray diagnosis, and physical medicine as applied to the treatment of arthritis

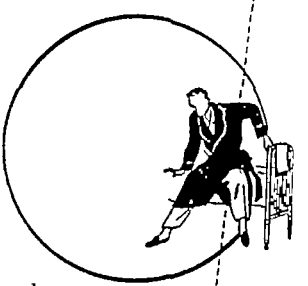
A scientific exhibit with nearly 100 displays will show clinical and pathologic material on subjects dealt with in the clinical conferences, and approximately 115 leading firms will display technical exhibits All exhibits will be open from Tuesday at 8 30 A M to Friday noon, November 30 to December 3

Papers will be read at the General Scientific Meetings in the St Louis Opera House from 9 to 10 A M and from 2 to 3 P M each day At least six demonstration units are planned for each half day in the Scientific Exhibit from 10 30 A.M to 12 NOON, and from 3 30 P M to 5 P M

Officers and members of the House of Delegates will stay at the Statler Hotel Those attending the Medical Public Relations Conference will stay at the Lennox Hotel

A registration form and a convenient blank for making reservations at a number of hotels is appearing in the *Journal of the American Medical Association* every other week until the Interim Meeting All reservations must be cleared through the Chairman, Subcommittee on Hotels, American Medical Association, Hotel Reservation Bureau, 1420 Syndicate Trust Building, St. Louis 1, Missouri, and must be received before November 9, 1948

[Continued on page 2416]



S*moother recovery after appendectomy*

You can help your patients to smoother comfortable recovery after appendectomies with Prostigmin By helping restore normal peristalsis and bladder tone the drug usually prevents intestinal distention and urinary retention Best result are generally *obtained by using Prostigmin* both before and after abdominal surgery Complete information on this and other uses of Prostigmin based on extensive literature will be sent upon request.

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Prostigmin®

'Roche'

brand of neostigmine

[Continued from page 2414]

Plan Meetings on Infant Mortality

IN AN attempt to lower the neonatal death rate and the incidence of stillbirth in New York County, the Special Committee on Infant Mortality of the Medical Society of the County of New York is planning a series of monthly meetings open to all members of the medical and nursing professions and medical students The meetings will be held in Room 441 of the Academy of Medicine Building, 2 East 103rd Street, New York City, on the third Wednesday of every month, at 4 00 P M

Each meeting will open with case presentations of stillbirths or neonatal deaths which, in the opinion of members of the Committee, were preventable Following the case presentations, an outstanding authority in the field will address the meeting and lead discussion of the cases presented Time will be allowed for questions from the floor

The schedule of meetings is as follows

November 17, 1948—"Surgery in the Newborn as a Preventive of Neonatal Death," Dr Edward J Donovan

December 15, 1948—"Prematurity, Its Prevention," Dr Arthur Reich

January 19, 1949—"Prematurity, Its Treatment," Dr Emmett Holt, Jr

February 16, 1949—"Anesthesia and Analgesia During Labor and Its Effect on Neonatal Death," Dr Emery A Rovenstine

March 16, 1949—"Maternal Contagion Causing Congenital Anomalies in the Newborn," Dr Murray H Bass

April 20, 1949—"Resuscitation of the Newborn," Dr Paluel J Flagg

May 18, 1948—"Breech Delivery as a Cause of Neonatal Death," Dr Ralph L Barrett

To Show Display of Radiation Detection Instruments

THE first comprehensive display of radiation detection instruments essential to the industrial, medical, and biologic applications of nuclear energy will be presented at a conference on electronic instrumentation in nucleonics and medicine in New York, November 29 through December 1, according to an announcement by Adrian Dahl, Chief, Radiation Instruments Branch, U S Atomic Energy Commission, Oak Ridge, Tennessee

The exhibit of the U S AEC will include 22 types of basic instruments for radiation detection These instruments, manufactured by 20 commercial companies, are typical of about 125 now in use, including components and others closely related

The purpose of the conference will be to show the unique problems facing the utilization of atomic energy and the need for cooperation and understanding between the electronics engineer, the physical scientist, and the medical doctor In addition to the instrument display the U S AEC is planning to participate with exhibits showing other instrument techniques which will be demonstrated by means of cutaway models

The program will include more than a score of papers presented by leading authorities active in development of various phases of research and development of atomic energy for commercial and scientific application

MEETINGS

FUTURE

American Otorhinologic Society for the Advancement of Plastic and Reconstructive Surgery

The annual meeting of the American Otorhinologic Society for the Advancement of Plastic and Reconstructive Surgery will be held at the Hotel Waldorf-Astoria, New York City, on November 4 A testimonial dinner will be held at 6 00 P M for Dr Samuel Fomon, honorary president Dr Fomon will present the paper of the evening, "Recent Development in Rhinoplastic Surgery Based on New Physiologic Concepts"

New York Academy of Medicine, Salmon Committee on Psychiatry and Mental Hygiene

The Salmon Committee on Psychiatry and Mental Hygiene has announced the sixteenth series of the Thomas William Salmon Lectures to be given by the distinguished Swedish biophysicist and biochemist, Dr Torbjoern Oskar Caspersson, professor of medical cell research and genetics and director of the Institute for Cell Research of the Medical Nobel Institute in Stockholm The series will be presented in Hosack Hall at the New York Academy of Medicine in New York City from November 8 through 10 in the evenings

Under the general title of "Cell Function and Cell Growth in Normal and Pathological Conditions, Studied by Quantitative Cytochemical Procedures," Dr Caspersson will describe his original research at the Karolinska Institute which is a division of the Medical Nobel Institute

PERSONALITIES

Honored

Dr Ludwig Adler, New York City, has been elected honorary fellow of the Societat Medicorum Svecana (Swedish Medical Society) in Stockholm and honorary member of the Gesellschaft der Aerzte in Vienna

[Continued on page 2418]

Free flow with



Heparin/ Pitkin Menstruum

'WARNER'

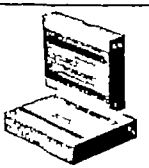
an anticoagulant preparation *with prolonged action for* the prevention and treatment of thromboembolic disorders

HEPARIN/PITKIN MENSTRUUM 'Warner' is a safe and clinically established means of providing prolonged anticoagulation action in the body

One subcutaneous injection of HEPARIN/PITKIN MENSTRUUM Warner is usually sufficient to increase the blood coagulation time for a period of 24 to 48 hours without the necessity for the cumbersome, discomforting and time-consuming procedures usually required when maintaining blood fluidity in thromboembolic disease

Heparin/ Pitkin Menstruum

WARNER'



is available in 200-mg and 300-mg ampuls for subcutaneous injection cartons of 6 ampuls each with or without *vasoconstrictors*

WILLIAM R WARNER & CO., INC

NEW YORK ST LOUIS LOS ANGELES

[Continued from page 2410]

COUNTY NEWS

Clinton County

Postgraduate instruction arranged by the Council Committee on Public Health and Education of the State Society, with the cooperation of the State Department of Health, will be given at a meeting of the Clinton County Medical Society on Tuesday night, December 14, at 8 15 P M At the Champlain Valley Hospital Nurses' Home, Plattsburg, Dr Paul A Bunn, associate professor of medicine, Syracuse University College of Medicine, will speak on "Problems in Physical Diagnosis"

Onondaga County

Dr Alexander Brunschwig, professor of clinical surgery at Cornell University Medical College and attending surgeon at Memorial Hospital, New York City, will speak on "Radical Surgery for Cancer" at the meeting of the Onondaga County Medical Society, to be held Tuesday night, November 9, at 8 30 P M, at the University Club, Syracuse

The program is postgraduate instruction arranged by the Council Committee on Public Health and Education of the State Society with the cooperation of the State Department of Health

Ontario County

At the meeting of the Ontario County Medical Society, held October 12 in Canandaigua, Dr Richard H Lyons, professor of medicine, Syracuse University College of Medicine, spoke on "Use and Abuse of Newer Drugs" as a program of postgraduate education, provided by the State Society and the State Department of Health

Suffolk County

Two speakers presented a program of postgraduate instruction at the meeting of the Suffolk County Medical Society held October 27 at Huntington Dr William B Sherman, director of the allergy clinic at Roosevelt Hospital, New York City, spoke on "Types of Allergy with Particular Reference to Nasal Allergy", and Dr Robert Chobot, assistant professor of pediatrics and chief of pediatric allergy at the New York Post-Graduate Medical School and Hospital, spoke on "Diagnostic and Therapeutic Procedures in Athsma"

Tompkins County

Dr George N Edson, compensation medical examiner for the New York State Workmen's Compensation Board of the State Department of Labor, will speak on "Medicolegal Aspects of Trauma" at the meeting of the Tompkins County Medical Society to be held Monday night, November 15, at 8 30 P M, at the Hermann M Biggs Memorial Hospital, Ithaca

The program is postgraduate instuction arranged by the Council Committee on Public Health and Education of the State Society with the cooperation of the State Department of Health

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SCIENTIFIC EXHIBITS
1949
ANNUAL MEETING

Applications for space for the scientific exhibits should be made directly to the Chairman of the Subcommittee on Scientific Exhibits of the Convention Committee

Dr J G Fred Hiss
505 State Tower Building
Syracuse 2, New York

The Annual Meeting will be held May 2 to 6, 1949, at the Hotel Statler in Buffalo

No applications can be considered after January 1, 1949

There will be two groups of awards

Awards in Group I are made for exhibits of individual investigation, which are judged on the basis of originality and excellence of presentation

Awards in Group II are made for exhibits which do not exemplify purely experimental studies and which are judged on the basis of excellence of presentation and correlation of facts

W P ANDERTON, M D, *Secretary*

To forestall this eventuality



CSC Syrup CHOLINE BICARBONATE

WHEN instituted early and in conjunction with a diet providing large amounts of protein and B complex vitamins, Choline therapy interrupts the chain of events in the development of portal cirrhosis. Thus fatty infiltration of the liver, the forerunner of cirrhosis, is overcome, and the fatal complicating cirrhosis is either forestalled or prevented.

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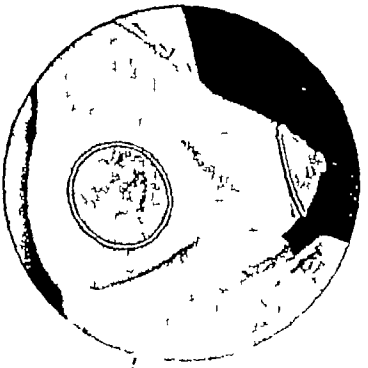
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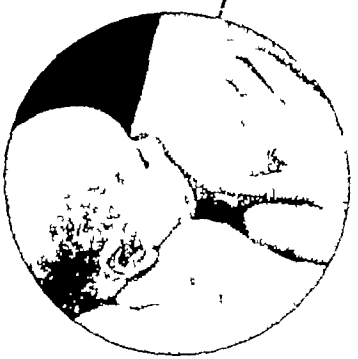
Officers—County Medical Societies—1948

TOTAL MEMBERSHIP AS OF NOVEMBER 1, 1948—22,206

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Chenango	J A Hollis	Norwich	J H Stewart	Norwich	J H Stewart	
Clinton	W W Johnson	Plattsburg	K M Clough	Plattsburg	K M Clough	Pl
Columbia	L D Carpenter	Germantown	L J Early	Hudson	L J Early	
Cortland	R H Kerr	Cortland	E F Higgins	Cortland	F F Sornberger	(
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Erie	E D Babbage	Buffalo	H G Walker	Buffalo	E A Woodworth	I
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Fulton	D M McMartin	Johnstown	R K Lenz	Gloversville	W H Raymond	Jo
Genesee	D B Johnson	Batavia	C C Koester	Batavia	C C Koester	
Greene	W A Petry	Catskill	W M Rapp	Catskill	M H Atkinson	
Herkimer	R. W Dennis	Herkimer	R C Ashley	Little Falls	R. C Ashley	Lit
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Kings	A W M Marino	Brooklyn	C H Loughran	Brooklyn	H Mandelbaum	I
Lewis	L A Avallone	Lowville	E A Barnes	Lowville	E A Barnes	
Livingston	F J Hamilton	Hemlock	R A Hemphill	Mt Morris	R A Hemphill	Mt
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Monroe	L B Soble	Rochester	J A Lane	Rochester	J L Norris	R
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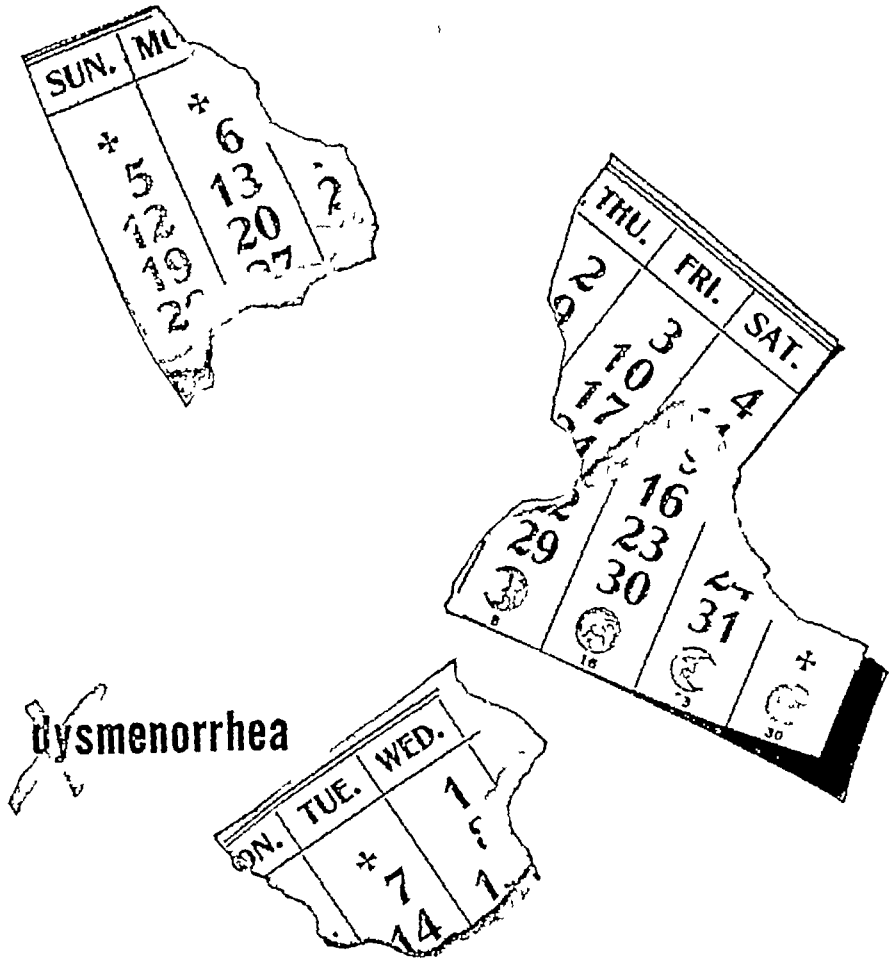
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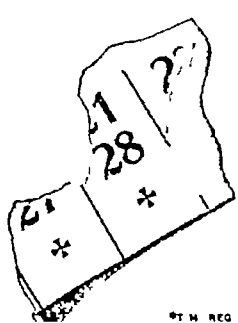
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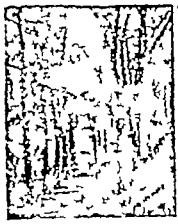
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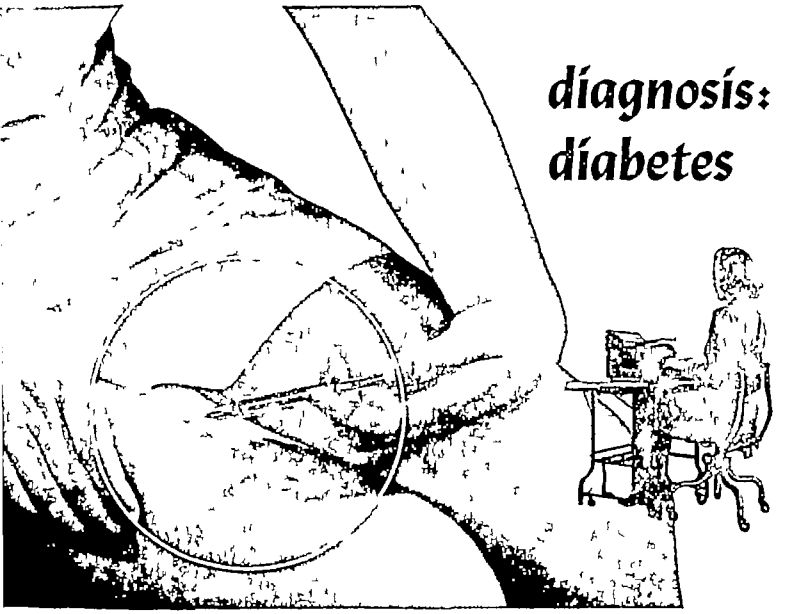
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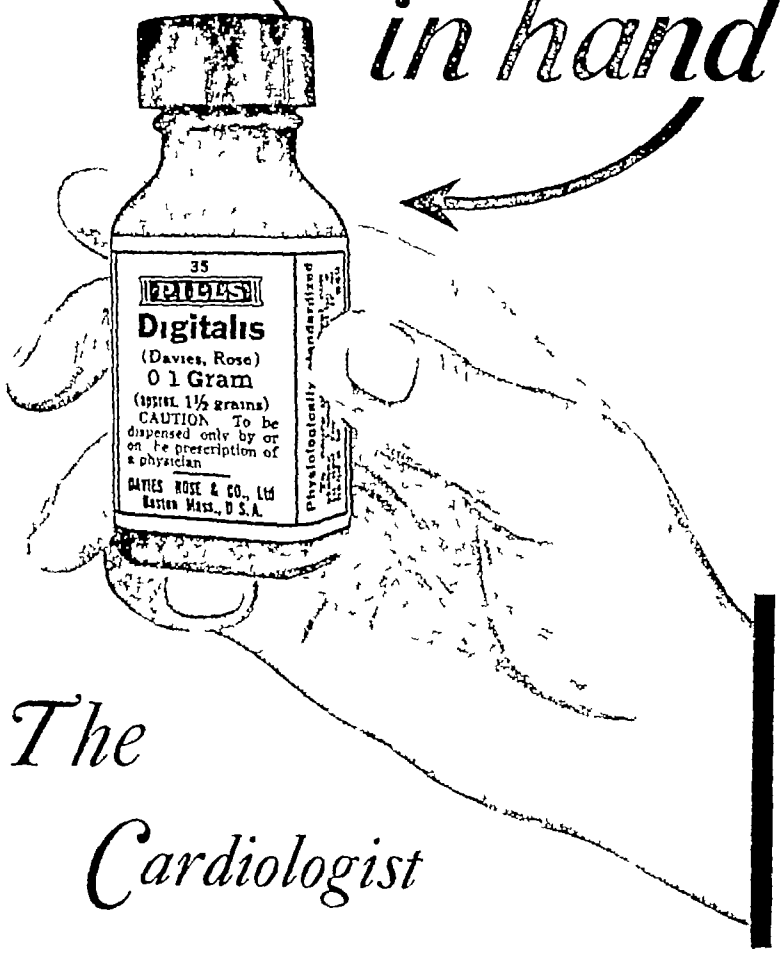


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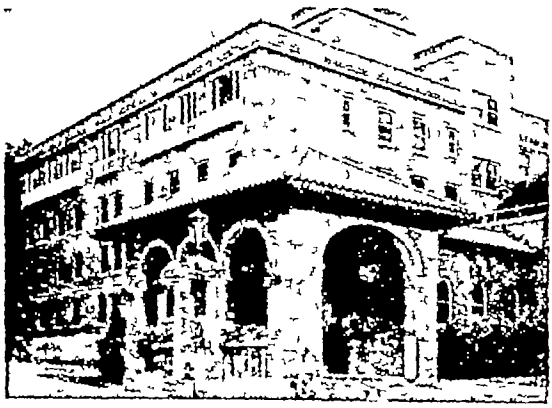
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CONTENTS

SCIENTIFIC ARTICLES

Sphenopalatine Ganglion Block for the Relief of Painful Vascular and Muscular Spasm with Special Reference to Lumbosacral Pain, *J Lewis Amster, M D, F I C A* 2475
Erythema Multiforme, *Maurice J Costello, M D*, and *Jules E Vandow, M D* 2481
Solar Burns of the Fundi, *Charles A Turtz, M D, F A C S* 2489

(Continued on page 2436)





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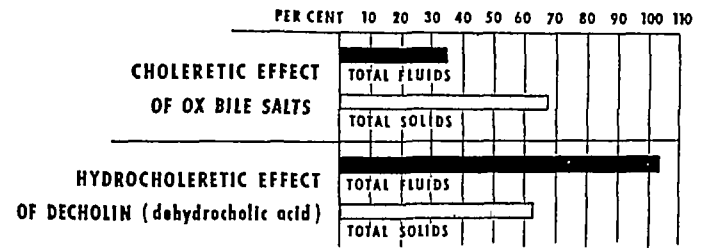
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(*CONTENTS—Continued from page 2434*)

Newer Aspects of Clinical Electrocardiography, *Richard Gubner, M D*, and *Harry E Ungerleider, M D* 2491
A Guide to the Use of Procaine Penicillin in Hospital Practice, *Gene H Stollerman, M D, Edward H Roston, M D*, and *Beatrice Tobarsky, M A* 2501
Elusive Mental Cases The Epileptic Personality, *B Liber, M D, F A P A* 2506

EDITORIALS

Hazards of X-Rays 2471
Current Editorial Comment 2472
Facts About Nutrition 2473

GENERAL FEATURES

Necrology 2528
Medical News 2530
Hospital News 2534
Woman's Auxiliary News 2538

MISCELLANEOUS

State Society Officers 2438, 2440, 2442
Abstract of Minutes of the Council of the Medical Society of the State of New York 2508
County Society Officers 2542



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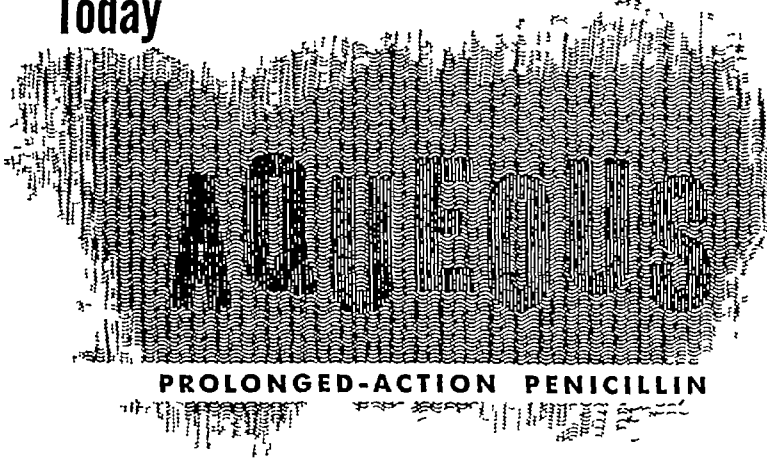
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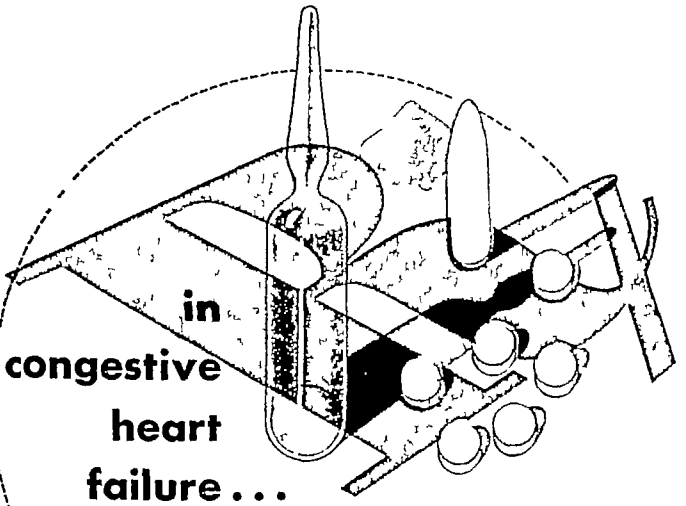
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1 Couch J F Krewson, C F , Naghski J and Copley M J : Bureau of Agriculture and Industrial Chemistry U S Dept of Agriculture, A I C 115 (1946)
2 Griffith J Q Jr , Couch J F and Lindauer M A : Proc Soc Biol and Med 55:228 (1944)
3 Zfass H S : Virg Med Monthly 74:56 (1947)
4 Shanna, R H Griffith J Q Jr and LaMotte, W , Jr : Scientific Exhibit Medical Society of State of Penna Phila Oct 7 10 (1946)
5 Streen L P Dental Items of Interest 70:153 (1948)
6 U S Dept of Agriculture Agricultural Research Administration Washington Letter January 24 (1946)

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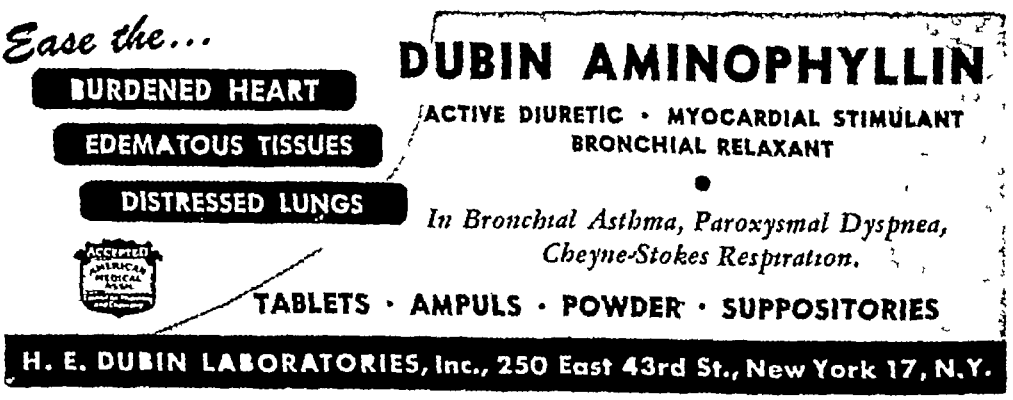
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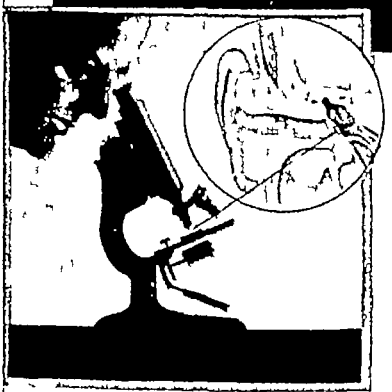
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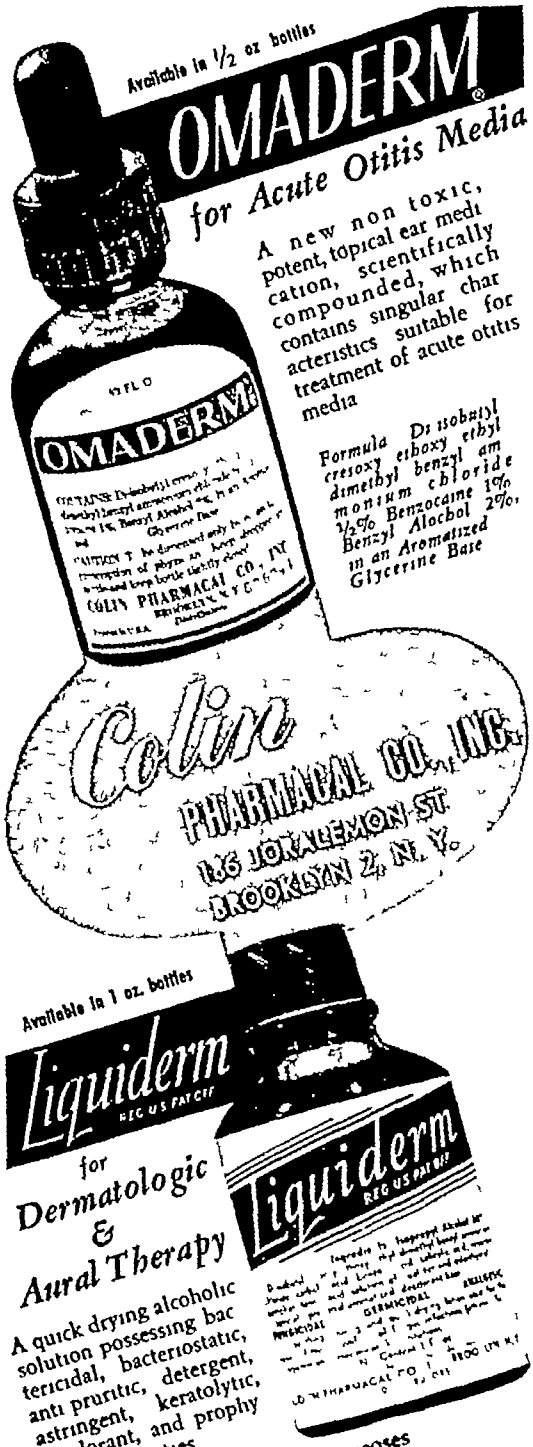
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INDEX TO ADVERTISERS

Ames Company Inc	2435
The Arlington Chemical Company	2466
Ayerst McKenna & Harrison Limited	2469
Dr Barnes Sanitarium	2537
Beech-Nut Packing Company	2451
Milton H Berry Foundation Schools	2533
Borcherdt Malt Extract Company	2438
George A Breon & Company	2432
Brewer & Company, Inc	2515
Brigham Hall Hospital	2535
Brunswick Home	2535
S H Camp and Company	2456
Carnation Company	2464
G Ceribelli & Co	2533
Ciba Pharmaceutical Products, Inc	3rd cover
Clifton Springs Sanitarium and Clinic	2434
Colin Pharmacal Co Inc	2446
Commercial Solvents Corporation	2517
Crane Discount Corporation	2448
The Doho Chemical Corporation	2443
Dome Chemicals Inc	2452
H E Dubin Laboratories Inc	2442
Endo Products Inc	2462
Falkirk in the Ramapos	2535
Flint Eaton & Co	2454
Fried & Kohler, Inc.	2431
Halcyon Rest	2535
J E Hanger Inc	2466
Harmon Chemicals Inc	2530
Hill Top Sanitarium	2535
Holbrook Manor	2535
Holland-Rantos Company, Inc.	2521
Homemaker s Products Corporation	2459
Interpines	2537
Ives-Cameron Company, Inc	2445
Lakeside Laboratories Inc	2467
Eli Lilly and Company	2470
Louden Knickerbocker Hall, Inc	2537
M & R Dietetic Laboratories, Inc	2519
Mandl School	2533
The Maples Inc	2537
Mead Johnson & Co	4th cover
Medico Press	2539
Merck & Co , Inc	2468
The Wm S Merrell Company	2nd cover
Modern Drugs	2523
National Confectioners' Association	2449
The National Drug Company	2463
Nepera Chemical Co , Inc	2465
The Nestlé Company Inc	2461
New York Medical Exchange	2541
Novocol Chemical Mfg Co , Inc	2440
Num Specialty Co	2448
Parke Davis & Company	2453
The E L Patch Company	2448
Pediforme Shoe Co	2448
Raymer Pharmacal Company	2520
R J Reynolds Tobacco Co	2433
William S Rice Inc	2462
A H Robins Company	2450
Sandoz Chemical Works, Inc	2436
Saratoga Springs Authority	2460
Schenley Laboratories Inc	2527
Schering Corporation	2457
Julius Schmid Inc	2458
G D Searle & Co	2441
E R. Squibb & Sons	2439
Standard Pharmaceutical Co Inc	2537
The Tarbonis Company	2444
Teca Corporation	2535
Charles B Towns Hospital	2537
Twin Elms	2535
Van Patten Pharmaceutical Co	2466
Varick Pharmacal Co	2531
Wander Company	2447
West Hill	2535
Westwood Pharmacal Corp	2455
Whitbread & Co Ltd	2454
White Laboratories, Inc	Between 2438-2439
Winthrop-Stearns Inc	2437
Wyeth Incorporated	2525



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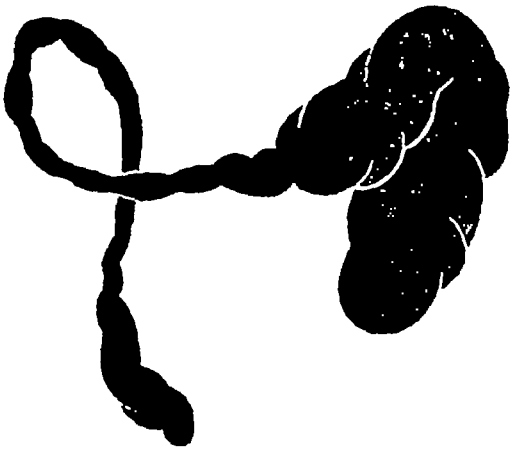


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PROTEIN	32.1 Gm.	VITAMIN B	1.18 mg.
FAT	31.5 Gm.	RIBOFLAVIN	2.00 mg.
CARBOHYDRATE	64.8 Gm.	NIACIN	6.8 mg.
CALCIUM	1.12 Gm.	VITAMIN C	30.0 mg.
PHOSPHORUS	0.84 Gm.	VITAMIN D	417 I U
IRON	12.0 mg	COPPER	0.50 mg.

Based on average reported values for milk



In Atonic and Spastic Constipation

KONDREMUL

an emulsion of Mineral Oil and Irish Moss

Gentle Effectiveness . . .
Patient Appeal

KONDREMUL provides a non-irritating, lubricating agent, softens the fecal mass and promotes smooth, natural elimination.

A gradation of treatment for all types of constipation is provided in the three forms:

KONDREMUL Plain (containing 55% mineral oil)

KONDREMUL with non-bitter Extract of Cascara (4.42 Gm per 100 cc)

KONDREMUL with Phenolphthalein— 13 Gm (2 2 grs) phenolphthalein per tablespoonful.

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RECOMMEND
APPLIED LIKE NAIL POLISH

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Contains extract of capsicum (2.34%) in a base of acetone nail lacquer and isopropyl. 50¢ and $1.00 per bottle at your surgical supply house or druggist.



Candy

FOR PRIMING PSYCHOGENIC AND SOMATIC PROCESSES

Although adequate to a nicety meals can readily lose much of their nutritional function unless prepared and served for gustatory appeal Drab meals may be refused denying the patient the benefit of needed nutrients and calories By virtue of variety of form color and flavor candies on the meal tray bring many welcome surprises of satisfaction Their very presence sets psychogenic and somatic processes into operation which are beneficial to appetite digestion and the nutritional state Rich in concentrated caloric energy and superlative in tastefulness morsels of candy may give the needed psychogenic therapeutic impulse to inflect upwards the curve of recovery

Candies are prepared with many valuable foods—milk butter eggs fruits, and nuts To the extent these foods are present candies provide biologically adequate protein appreciable amounts of the important minerals calcium phosphorus and iron and B complex vitamins Thus candies deserve recommendation whenever the clinical situation at hand permits this gustatory and psychogenic treat

COUNCIL ON CANDY OF THE NATIONAL Confectioners' ASSOCIATION

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widening the range

of spasmolytic therapy with the new, unique

DONNATAL elixir

Donnatal—outstanding spasmolytic and sedative—*is now available in liquid form!*

Donnatal Elixir fills a long-felt need, particularly among pediatricians for the treatment of pyloric stenosis, intestinal colic, diarrhea and enuresis. For adults too, patient preference may suggest the Elixir in place of the Tablets—each 5 cc. (1 teaspoonful) providing the therapeutic effect of 1 tablet.

Important new evidence on Donnatal attests its unusual clinical efficacy and its advantages over single drugs and synthetics.

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RICHMOND 19 VIRGINIA
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formula *Each teaspoonful (5 cc.) contains:*
Hyoscyamine Sulfate.....0.1037 mg
Atropine Sulfate.....0.0194 mg
Hyoscine Hydrobromide 0.0065 mg
Phenobarbital (¼ gr.).....16.2 mg

DONNATAL elixir

Another Robins Triumph

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It takes all three

to make the right infant feeding schedule

THE DOCTOR advises what the baby should eat He will recommend scientifically prepared baby foods that have the natural food values and flavor retained in high degree. Beech Nut makes baby foods the way doctors and food specialists want them made.

THE BABY instinctively knows *how much* he wants to eat—and many food specialists now say Don t feed your baby too much

THE MOTHER lets her baby s own appetite decide *when* and thus establish an easy to-keep feeding schedule. Meal time can be happy time when Doctor Baby and Mother get together

Beech-Nut

FOODS *for* BABIES

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INDEX TO ADVERTISED PRODUCTS

Ad-Vitum Drops (Ives-Cameron Company, Inc) 2445
Aminophyllin (H E Dubin Laboratories, Inc) 2442
Aminophyllin (G D Searle & Co) 2441
Aspergum (White Laboratories, Inc) Between 2438–2439
Auralgan (The Doho Chemical Corporation) 2443
Bellergal (Sandoz Chemical Works, Inc) 2436
Caminoids (The Arlington Chemical Co) 2466
Cepacol (The Wm S Merrell Company) 2nd cover
Crystacillin (E R Squibb & Sons) 2439
Daxalan (Dome Chemicals Inc) 2452
Decholin (Ames Company, Inc) 2435
Diethylstilbestrol (George A Breon & Co) 2432
Diaparene (Homemaker's Products Corp) 2459
Digitaline Nativelle (Varick Pharmacal Co) 2531
Donnatal (A. H Robins Company) 2450
Ferrolivron (Harmon Chemicals, Inc) 2539
Kondremul (The E L Patch Company) 2448
Koromex (Holland-Rantos Company, Inc) 2521
Kwell Ointment (Commercial Solvents Corporation) 2517
Mandelamine (Nepera Chemical Co, Inc) 2465
Metandren Linguets (Ciba Pharmaceutical Products, Inc) 3rd cover
Mercuhydrin (Lakeside Laboratories, Inc) 2467
Neo-Antergan (Merck & Co, Inc) 2468
Nucarpon (Standard Pharmaceutical Co, Inc) 2537
Oleum Percomorphum (Mead Johnson & Co) 4th cover
Ol-Vitum Drops (Ives-Cameron Company, Inc) 2445
Omaderm (Colin Pharmacal Co, Inc) 2446
Orapen-250 (Schenley Laboratories, Inc) 2527
Oreton-M (Schering Corporation) 2457
Ovaltine (The Wander Company) 2447
Petrogalar (Wyeth Incorporated) 2525
Premarin (Ayerst, McKenna & Harrison Ltd) 2469
Protinal Powder (The National Drug Co) 2463
Ramses (Julius Schmid, Inc.) 2458
Ray-Formosil (Raymer Pharmacal Co) 2529
Scoruton (Novocol Chemical Mfg Co, Inc) 2440
Similac (M & R Dietetic Laboratories, Inc.) 2519
Syrup Choline (Flint, Eaton & Co) 2454
Taka-Combex Kapseals (Parke, Davis & Co) 2453
Tarbonis (The Tarbonis Company) 2444
Thesodate (Brewer & Company, Inc) 2515
Thyrobrom (Van Patten Pharmaceutical Co) 2466
Thum (Num Specialty Co) 2448
Topocide (Eli Lilly and Company) 2470
Tricreamalate (Winthrop-Stearns Inc) 2437
Vifort (Endo Products Inc) 2462
Westsal (Westwood Pharmacal Corp) 2455

Dietary Foods

Baby Foods (Beech-Nut Packing Co) 2451
Evaporated Milk (Carnation Company) 2464
Evaporated Milk (The Nestlé Company, Inc) 2461
Malt Soup Extract (Borcherdt Malt Extract Co) 2438
Milk Stout (Whitbread & Co, Ltd.) 2454

Medical and Surgical Equipment

Artificial Eyes (Fried & Kohler, Inc.) 2431
Artificial Limbs (J E Hanger) 2466
Hydrogalvanic Generators (Teca Corp) 2535
Orthopedic Shoes (Pediforme Shoe Co) 2448
Supports (S H Camp and Company) 2456
Supports (William S Rice, Inc) 2452

Miscellaneous

Brioschi (G Ceribelli & Co) 2533
Candy (National Confectioners' Association) 2449
Cigarettes (R. J Reynolds Tobacco Co) 2433
Modern Drug Encyclopedia (Modern Drugs) 2523
Spring Water (Saratoga Springs Authority) 2460

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the DAXALAN-DOME-PASTE BANDAGE TECHNIQUE

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This technique is based on a 3 point program—

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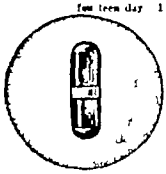
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TAKA COMBEX Kapseals assist in correcting faulty starch digestion and in restoring favorable balance of the water soluble vitamins. The recommended dosage supplies B vitamins and vitamin C in amounts which may prevent deficiencies arising from states of medical and surgical stress. TAKA-DIASTASE® – potent starch-converting ferment – compensates for amylolytic enzyme deficiency and relieves distension eructation and other discomforts of impaired starch digestion.

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Taka-Diastase	3½ gr.
Vitamin B_1 (Thiamine Hydrochloride)	3 mg.
Vitamin B_2 (Riboflavin)	2 mg.
Vitamin B_6 (Pyridoxine Hydrochloride)	0.5 mg.
Pantothenic Acid (Sodium salt)	2 mg.
Nicotinamide (Niacinamide)	10 mg.
Vitamin C (Ascorbic Acid)	30 mg.

With other components of the Vitamin B Complex derived from Brewers Yeast.

PACKAGE INFORMATION: Available in bottles of 100 and 1000.

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REPRESENTING CHOLINE DIHYDROGEN CITRATE 25% w/v

Each teaspoonful presents one Gm Choline Dihydrogen Citrate

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Palatable • Well Tolerated

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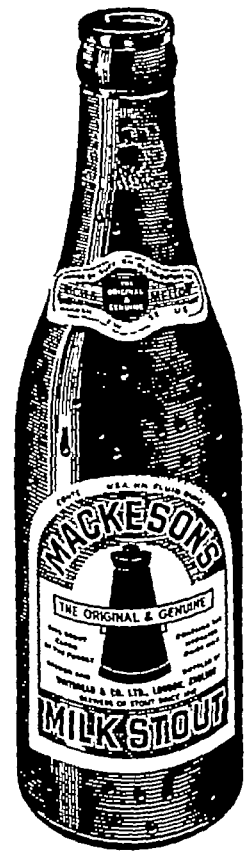
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here's **The Stout Your Patients can Enjoy!**

Long a favorite in the United Kingdom and throughout the world because of its creamy mellowness, Mackeson's Milk Stout—an entirely different and really delicious brew—is now available in America

Mackeson's Milk Stout has all the qualities of fine stout and has long been recommended in cases wherever it is considered that a stout may be advisable It contains the carbohydrates of the purest dairy milk

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the only salt substitute that tastes exactly like salt

westsal is a joy to patients on low salt (sodium) diets It s the *only* salt substitute that makes food taste *exactly* as if seasoned with salt No bitter no disagreeable taste Used freely at the table—in cooking and baking ✪ Sodium free safe convenient *westsal* assures eating without cheating a minimum intake of harmful sodium, better nourishment and grateful happier patients in

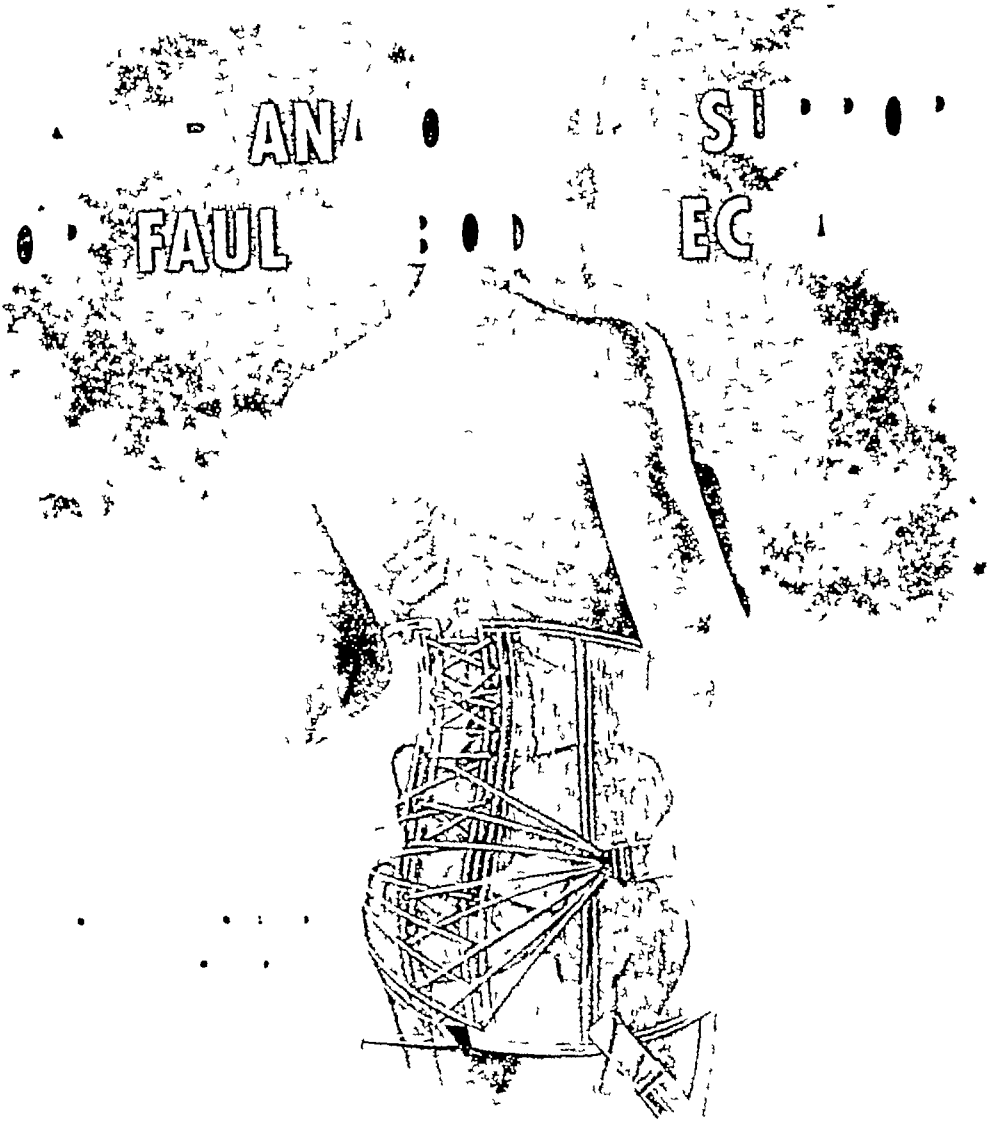
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westsal is a solution of lithium chloride with small amounts of citric acid and potassium Iodide (Iodizing traces) Bottles of 2¼ oz.



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Whatever the mystic significance formerly attributed to this astronomical interrelation, recent discoveries in endocrine therapy — the use of the male hormone in the treatment of female disorders. The antiestrogenic action of the male hormone including its inhibiting effect on the uterine musculature facilitates control of gynecologic disturbances

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METHYLTESTOSTERONE U.S.P. XIII *tablets*

are effective — by mouth — in the management of dysmenorrhea and premenstrual distress, functional uterine bleeding and the menopause. In the puerperal patient ORETON M* relieves breast engorgement, abolishes after pains and inhibits lactation.

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ORETON M Tablets of 10 mg.: bottles of 18, 30 and 100; or 25 mg.: bottles of 15 and 100

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VAGINAL JELLY

Provides the patient with twofold protection

1 It occludes the cervix for as long as 10 hours

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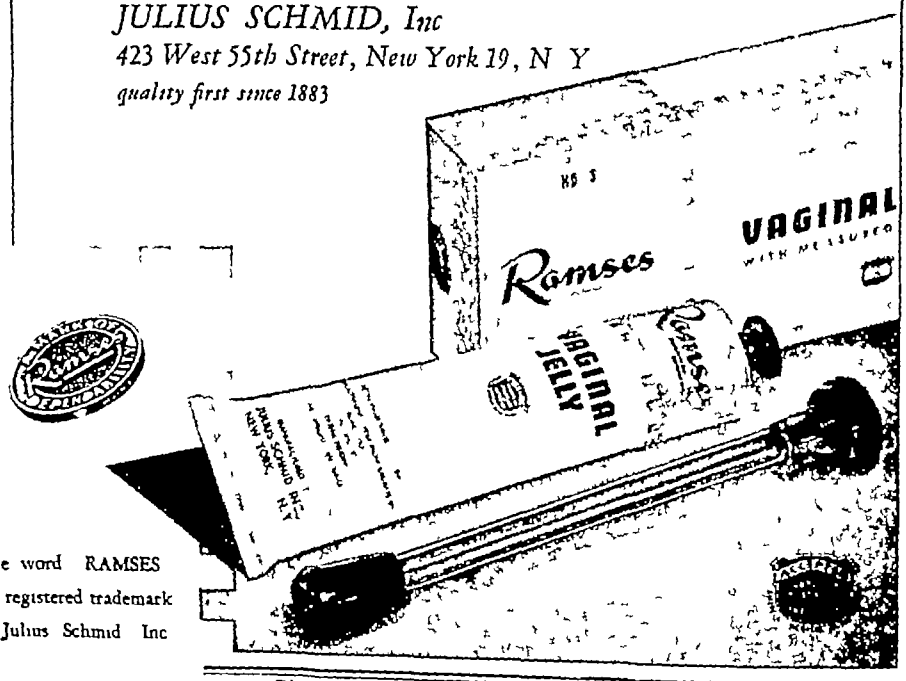
†Active Ingredients Dodecaethyleneglycol Monolaurate 5% Boric Acid 1%, Alcohol 5%

gynecological division

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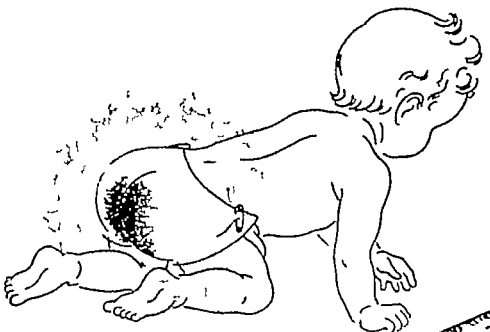
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DIAPER RASH (AMMONIA DERMATITIS) *is preventable...*



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Boxes of 20 and 40 Tablets

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1. Cook, J.V. Brennemans Practice of Ped. 4, Chap. 41, 1945.
2. Brown, R.A. et al. J. Ped. 31:749-754, 1947
3. Portman, R.B. Skin & Cancer Clinic, Post Graduate Hospital, New York, 1948.

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MEDICATES THE DIAPER

ELIMINATES CAUSE OF DIAPER RASH!

Findings from the Saratoga Spa records*



CARBON DIOXIDE BATHS in circulatory diseases

The physiological observations of the influence of carbon dioxide baths show a decrease in the pulse rate, an increase in the pulse pressure dependent mainly on a drop of the diastolic pressure, a better emptying of the venous blood vessels a hyperemia with increased capillary circulation, a slightly elevated minute volume output of the heart, an increase in respiration and the elimination of large quantities of the carbon dioxide through the lungs

In evaluating the results of this treatment for patients with circulatory disorders there is no ideal test of cardiac function and in these patients the ability to walk or exercise without the production of symptoms is used in judging their clinical gain In addition, in the patients with coronary disease suffering from anginal attacks, it is striking to note the decrease in the frequency and severity of these attacks In some patients they will disappear completely

Objective changes as seen in physical examination and in the studies of pulse rate, blood pressure, roentgen ray findings, electrocardiographic tracings, and vital capacity are noted in many patients

The clinical improvement of many patients undergoing treatment, their continued well being after their return home and their desire periodically to return for further treatment all indicate that the carbon dioxide bath has its place in the treatment of disorders of the circulation

*As printed in International Clinics Vol. 1 page 199 March 1937



The SARATOGA SPA

"Physician, Give Heed to Thine Own Health"

Many physicians have come to the Spa for the same kind of treatments that have helped their patients here After a restorative "cure" at the Spa, you, too, will return to your practice refreshed—revitalized—ready for the busy days that lie ahead

For professional publications of the Spa, and physician's sample carton of bottled waters with their analyses, write W S McClellan, M D, Medical Director, Saratoga Spa, 155 Saratoga Springs, New York

Listed by the Committee on American Health Resorts of the American Medical Association

THE EMPIRE STATE'S CONTRIBUTION TO THE MEDICAL PROFESSION

Your Job— And Ours:

To Fortify Baby's Health

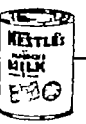
Babies who enjoy the benefit of your professional supervision have added assurance of sound growth and extra protection from infant ills. Proper nutrition, of course plays a basic role in baby s healthy development; and in this field the use of Nestlé's Evaporated Milk provides the full value of whole cow s milk plus something extra—pure Vitamin D3



Nestlé's Has the "Know-How" to Produce a Good Product

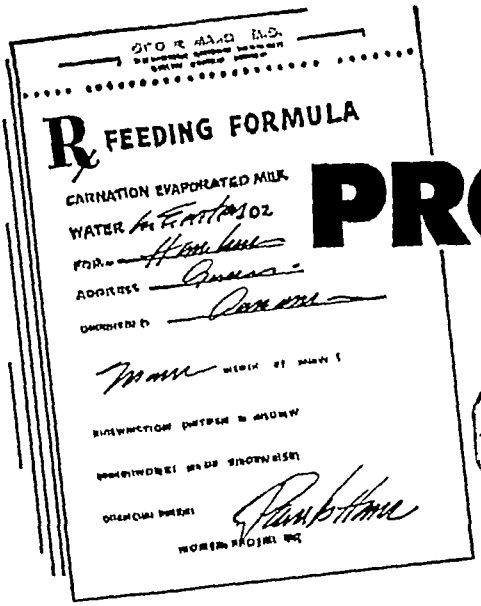
- For over 80 years, Nestle s milk products have been best known most used for babies round the world
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NESTLÉ's
EVAPORATED
MILK



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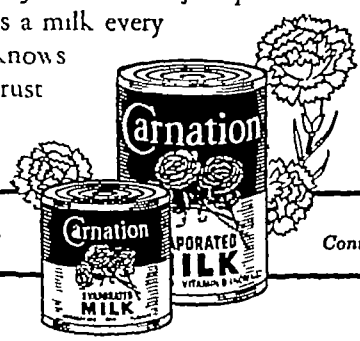
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WHEN YOU PRESCRIBE a Carnation Milk formula by name, you *know* your confidence is justified Carnation guards your recommendation with unsurpassed standards of safety, uniformity and nutritional value

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Nation wide surveys indicate that Carnation Milk is more widely used in infant feeding than any other brand of evaporated milk



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"From Contented Cows"

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MANDELAMINE —a chemical combination of methenamine and mandelic acid —affords constant, high effectiveness in common infections of the urinary tract.

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MANDELAMINE is the registered trademark of Nepera Chemical Co Inc for its brand of Hexydaline.

1. Beadi, I. V. and Duca, C. J.: J. Urol. (to be published).
2. Carroll, G. and Allen, H. M.: J. Urol. 55 674 (1946)

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(METHENAMINE MANDELATE)

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*Arlington

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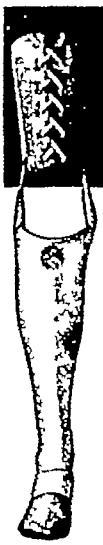
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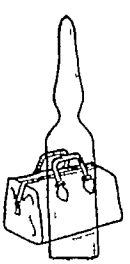
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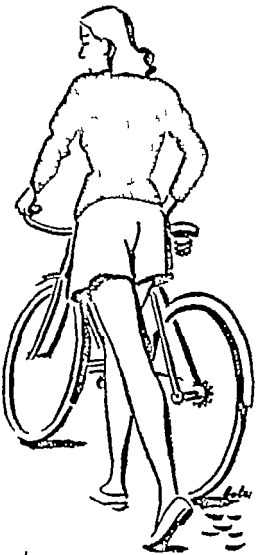
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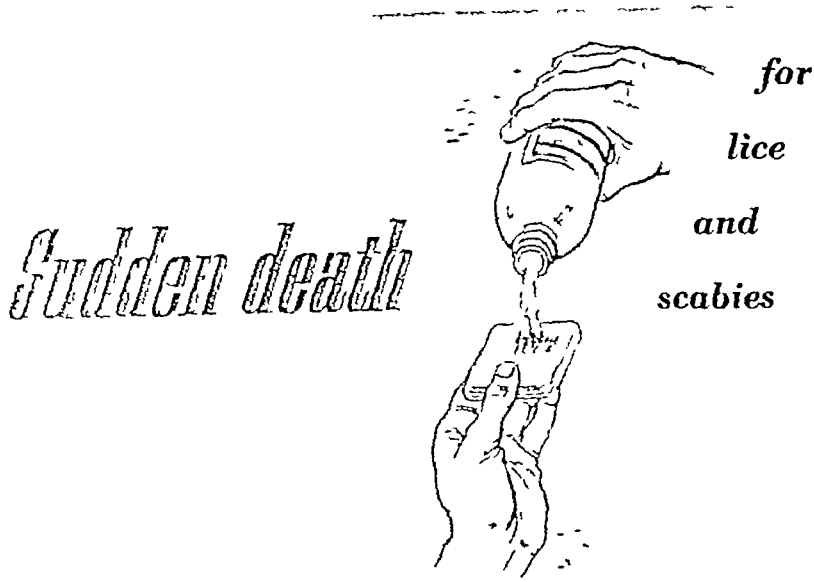
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VOLUME 48 | NOVEMBER 15 1948 | NUMBER 22

Editorials

Hazards of X-Rays

The *Journal of the American Medical Association* in a recent issue voices timely warning of the hazards of x-rays.[1] Although long in use, these rays, carefully studied since the time of Roentgen, have achieved wider applicability in medicine both for diagnostic and therapeutic purposes through the years Hazards have increased with greater power output of tube generators and more general use of this type of radiation Says the *Journal*

Roentgen rays for diagnosis (films and fluoroscopy) are safe only because radiologists have a long tradition of being careful, and because films and screens are so sensitive as to require rather small exposures. Examples of accidental erythema or redness continue to appear and even of disastrous roentgen ulceration. Any of these come from fluoroscopy for bone setting and for removing foreign bodies. The hazard seems higher among surgeons and general practitioners than among x ray specialists Paradoxically the smaller types of x ray machines have provided most of the worst cases Every radiologist has a collection of anecdotes to show how dangerous roentgen rays can be in the hands of those not specially trained

In treating cancer big doses of radiation are used Resulting damage to skin and normal structures is severe and obvious Blistering is often only the proof that a thoughtful and conscientious therapist has given enough radiation to have a chance to cure. Such damage including the possibility of late roentgen ulceration or late roentgen cancer, is not too high a price to pay for cure of a cancer, regrettable, but at present necessary Perhaps new medical discoveries regarding cancer will outmode the present radiation therapy

Familiarity with any medium unfortunately may breed contempt in some instances especially when the familiarity may be putative rather than actual The warning against x-ray hazards as expressed by the *J.A.M.A.* is the more necessary and important for this reason

Even small quantities of roentgen or radium rays can prove damaging. Radiation injury to the skin sometimes leads to cancer coming even many years after Some of these patients did

[1] 138:214 (Sept. 18) 1948.

not show immediate injury, even so much as redness of the skin Repeated or continuous irradiation of the whole body can produce aplastic anemia, sometimes leukemia, even when the individual doses have been moderate

Now we stand on the threshold of a new era—the atomic age, with many new modalities and kinds of radiation available for research and therapy If the hazards of the old apparatus are not as yet fully appreciated, with all the experience the profession has had with it and with radium, one hesitates to consider the potential hazards in the use of radioactive isotopes on a large scale Continual education of the profession to combat the use of the newer modalities by the partly informed is highly necessary The Medical Society of the State of New York through its Council Committee on Health and Education is already undertaking this task so essential to the interest of both profession and public

Current Editorial Comment

Radiologic Warfare Atomic medicine for doctors is now being taught at the University of California [1] Dr Stafford Warren, formerly head of the radiology section of the Atomic Bomb Project, has inaugurated, as dean of the Medical School, a special three-week seminar in atomic medicine Addressing a large group of private physicians, local, state, and federal public health officers and U S Army and Veterans Administration doctors attending the Seminar,

> Dr Warren said that in a war emergency "groups like this will have to be the nucleus of any defensive or protective organization that is set up"
>
> Atomic fission, he said, had given rise to a new science of "nonstatic biology" calling for revised concepts if man was to cope adequately with the perils of atomic warfare and to exploit radiology
>
> Dr Warren depicted the new field as involving to a great degree relativity rather than the absolutes with which scientists were accustomed to deal
>
> Noting that the physicists, chemists, and engineers with whom atomic fission originated "think in terms of a small percentage error because they deal with fixed conditions," Dr Warren, who is one of the nation's leading authorities in atomic medicine, said that the application of fission to medicine, human beings, and the whole field of biology created a great new area where quantities were not static and precise, but dynamic and constantly changing
>
> "The human body," he said, "is like an engine going at a moderate speed, and you have to pick off your sampling while the engine's running If you stop the machine, you get an abnormal result
>
> "This concept of nonstatic conditions of biologic materials is largely new It's crept up on us
>
> "This is where we have the greatest lack today, nationally and internationally, as concerns the study of radioactivity in warfare and large-scale contaminations
>
> "You can't just say you'll have so many microcuries (radiation units) spread in a certain area uniformly There is no such thing as uniformity on such a large scale"
>
> In illustration, he cited the recent revelation through experiment with radioactive sodium in humans that bones were not, as traditionally regarded, merely static structural members of the body, but "constantly fluctuating chemical storehouses," containing as much as 20 per cent of the body's salt reserve and pouring out and absorbing chemicals in "tides" according to bodily demand
>
> "If you don't have this concept of change, your findings will be entirely unexplainable or confusing," Dr Warren said
>
> "In experiments with radioactive substances," he added, "it's not enough just to establish the existence of a concentration They don't mean much by themselves It's only in relation to other concentrations in the body that they have significance"

[1] New York Times August 3, 1948, p. 16

FACTS ABOUT NUTRITION

Prepared by the School of Nutrition, Cornell University, Ithaca
Norman S Moore, M D , Editor

Examples of Biochemical Interrelationships Among Nutrients

One of the most fascinating chapters in the science of nutrition is being unfolded by biochemists who are investigating the mechanisms by which the essential nutrients perform their functions in living organisms This new knowledge is not only of fundamental interest to nutritionists, but it also furnishes a rational basis for the quantitative interrelationships of nutrients, and it ultimately will provide methods for evaluating nutritional status With clarification of the biochemical functions of the nutrients, the interrelationship between the various essentials has become increasingly evident. It is the purpose of this brief article to point out examples of these interrelationships and to indicate their importance in nutrition

For example, iron is an indispensable nutrient It is a necessary constituent of hemoglobin as well as a number of oxidation-reduction enzyme systems essential for the life of cells. Some of these are catalase, peroxidase, the cytochromes, and cytochrome oxidase However, in order for the body to convert the iron to hemoglobin, another indispensable dietary nutrient must be present, namely, copper Hemoglobin is a conjugated protein and is a complex compound composed of hemo, iron protoporphyrin, and globin All of the indispensable amino acids which comprise the globin molecule must be provided by dietary protein Add to the foregoing the role of folic acid in stimulating the hematopoietic system, and one arrives at the point where the interrelationships of various dietary essentials have ceased to be of interest solely as academic pursuits but are of immense value in preventive as well as clinical medicine.

Let us consider another example The primary function of both carbohydrates and fats in the diet appears to be their value as a source of calories In the breakdown of these nutrients to their end products of carbon dioxide and water, the energy locked in the original carbohydrate and fat molecules is liberated for use in biochemical reactions and eventually appears as heat Thiamin is necessary for the complete utilization of carbohydrate but not of fat. In fact, increasing the proportion of fat to carbohydrate calories in the diet spares or reduces the requirements of thiamin The latter, in combination with phosphoric acid, functions as a coenzyme for the oxidation of pyruvic acid, an intermediate product in the breakdown of carbohydrate. In the absence of thiamin, the splitting of carbohydrate stops at the pyruvic acid state, and this acid accumulates in the tissues If the accumulation is prolonged, signs and symptoms of thiamin deficiency appear Knowledge of the function of thiamin has helped to explain the paradox of why the average Oriental diet containing approximately the equivalent in thiamin to that of the average Occidental diet still does not prevent a high incidence of beriberi At least a partial explanation is that the Eastern diet contains a higher proportion of calories in carbohydrates than does the Western diet, and, therefore, it requires more thiamin for its utilization.

Although thiamin appears to be primarily concerned with the utilization of carbohydrate, other members of the vitamin B complex are necessary for the utilization of energy derived from carbohydrates. These same vitamins are required for the metabolism of fat and protein Specifically, niacin and riboflavin are known to function as constituents of coenzymes which serve as hydrogen transport agents. In the metabolism of the major foodstuffs, the hydrogen

in the molecules is stripped off and carried by a series of oxidation-reduction enzyme reactions to eventual combination with oxygen, to form water Niacin and riboflavin, as well as iron and amino acids, are nutrient essentials which are indispensable components of this hydrogen transport and energy producing system

It is interesting to note in this connection that ariboflavinosis and pellagra are commonly seen together as multiple deficiencies, particularly in humans, a species requiring exogenous sources of both riboflavin and niacin Furthermore, the long known relationship between protein and pellagra has recently been clarified by the findings that the essential amino acid, tryptophane, serves as a precursor of niacin synthesis Thus, it is possible to explain why diets high in corn in southern areas of this country may lead to pellagra although they contain as much niacin as the diets in other areas where pellagra is not endemic Corn protein is deficient in the amino acid tryptophane People depending on corn protein not only have a niacin deficiency but lack the necessary precursor found in diets containing higher quality protein

These few examples illustrate the mechanisms by which various nutrients function in biochemical reactions necessary for cell life They also explain why a diet to be complete must furnish a variety of nutrients An understanding of these mechanisms is essential for sound agricultural planning and for public health promotion through nutrition The former is concerned with the production of necessary nutrients in our nation's food supply, the latter with the proper and efficient use of these nutrients

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Scientific Articles

SPHENOPALATINE GANGLION BLOCK FOR THE RELIEF OF PAINFUL VASCULAR AND MUSCULAR SPASM WITH SPECIAL REFERENCE TO LUMBOSACRAL PAIN

J Lewis Amster M D F I C A New York City

(From the Morrisania City and Bronx Hospitals and the Bronx Eye and Ear Infirmary)

HAVING practiced general surgery for many years and having previously practiced in the field of anesthesia I have always been intensely interested in the development and advancement of general and regional anesthesiology and therapeutic nerve block. At the outset I wish to emphasize that I do not claim to be an anatomist or a physiologist nor am I a neurologist or a nose and throat specialist This paper is based on three years personal clinical experience with the use of sphenopalatine ganglion block for the relief of painful muscular and vascular spasm with special reference to lumbosacral and sacroiliac pain

The conquest of pain is of vital importance. For many years sedatives and narcotics were our principal weapons against intractable pain More recently, we have fought pain due to spasm with new implements namely therapeutic nerve block and sympathetic nerve operations [1] The pathways of pain have been explored and studied new local anesthetic agents have been discovered and new technics for their administration have been devised [1] These new procedures are founded on a firm neuro-anatomic and physiologic basis and have been accepted as ideal therapeutic measures for the relief of many painful muscular and vasospastic disorders

The alleviation of pain, from a surgical point of view, was advocated and practiced by Rene LeRiche during the first World War [2] His pioneer work with therapeutic nerve block and surgery of the sympathetics led others to use his procedure in the treatment of painful conditions following war wounds In his writings he emphasizes the important part played by the autonomic nervous system in the production of pain due to muscular and vasospastic disorders

Labat followed in the footsteps of LeRiche when he recommended therapeutic nerve block and ganglionic nerve block for the relief of pain [3] Although many outstanding anatomists physiologists, and neurologists were unwilling to accept the views expressed by these pioneers LeRiche and Labat continued their work unconcerned and undismayed

In time LeRiche abandoned infiltration of peripheral nerves and peripheral neurotomies and adopted sympathetic ganglion infiltrations and operations on the sympathetic ganglia for the majority of painful spastic conditions He was convinced that a certain kind of pain apparently due to vasoconstriction, originated in the sympathetics The fact that operations on the sympathetics caused this pain to disappear confirmed his opinion. Thirty years ago it was generally believed that the sympathetic was a purely motor nerve. Physiologists held that the sympathetics had no centripetal fibers and that they did not have the faculty of forming a reflex arc LeRiche and Bruecker came to the conclusion that the sympathetics do have certain centripetal elements in that they could form reflex arcs and could be the starting points of painful phenomena [1]

When we speak of the autonomic nervous system our attention is usually directed to the sympathetic trunks We apparently overlook the four cephalic sympathetic ganglia the sphenopalatine ciliary otic and submaxillary

The sphenopalatine or Meckel's ganglion sometimes spoken of as the sphenomaxillary or nasal ganglion is a small triangular body about 5 mm. in diameter It is situated in the upper portion of the sphenopalatine fossa just beneath the superior maxillary or the second division of the fifth nerve It receives the following branches

Sensory Roots Two from the superior maxillary division of the fifth nerve

Motor Root Probably derived from the

Presented at the 142nd Annual Meeting of the Medical Society of the State of New York New York City Section on Anesthesiology May 19 1948.

nervus intermedius through the great superficial petrosal nerve and is supposed to consist, in part, of sympathetic efferent fibers from the medulla In the sphenopalatine ganglia, these fibers form synapses with neurons whose postganglionic axons, vasodilator and secretory fibers are distributed with deep branches of the trigeminal to the mucous membrane of the nose, soft palate, tonsils, uvula, roof of mouth, upper lips and gums, and upper part of the pharynx.

Sympathetic Root Derived from the carotid plexus through the deep petrosal nerve These two nerves join to form the nerve of the pterygoid canal Vidian before their entrance into the ganglion [4]

The sphenopalatine obviously belongs to the series of sympathetic nodes and is connected with the superior cervical ganglion, thus making it part of the sympathetic ganglion chain (Fig 1) Interruption of the sphenopalatine ganglion may be produced by anesthetizing or destroying the ganglion through three different approaches (1) the lateral or zygomatic route (2) the inferior or palatine route, and (3) the anterior or intranasal route

Sluder was probably one of the first to recognize the anesthetic value of sphenopalatine block for the relief of intractable pain, but little attention was paid to this discovery until Ruskin began his

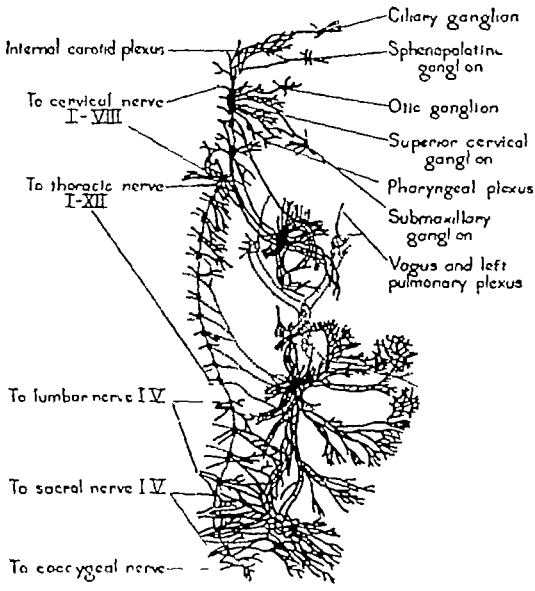


FIG 1 Diagram of the sympathetic nervous system The dotted lines indicate the branches of the cerebrospinal nerves which join the sympathetic system and those sympathetic nerves which are composed in major part of fibers from the cerebrospinal nerves

(Reprinted from Ranson, Stephen W The Anatomy of the Nervous System, Philadelphia, W B Saunders Co , 1936)

experimental and clinical work along these lines [5 6] To him belongs the credit for rediscovering and reviving the neglected treatment

Captain Neuberger of the United States Navy has advocated the destruction of the sphenopalatine ganglion by electrocoagulation for the relief of hay fever [4] Ruskin reported the use of alcohol injections for the purpose of destroying the ganglion and relieving pain [5] He later recommended the topical application of cocaine over the area of the sphenopalatine ganglion through the nasal route for the control of painful vascular and muscle spasm The destruction of the ganglion with alcohol or electrocoagulation is not an entirely simple procedure, and there is some danger that it may produce sloughing, hemorrhage, or damage to the olfactory nerve The results of topical application of an anesthetic agent through the anterior or intranasal route are very striking, and the simplicity of this method, combined with its safety, the spontaneous relief of pain, and the absence of any toxic reactions, together with the economy of treatment, have earned for sphenopalatine block the name of an unbelievable therapeutic ganglion block

At a meeting of the American Society of Regional Anesthesia in 1935, Kuntz read a paper on *"The Anatomical and Physiological Basis of Nerve Blocking and Regional Anesthesia with Reference to Autonomic Nerves"* [7] In the course of the discussion, Dr Kuntz was asked if he could offer an explanation for the successful relief of lumbar pain, lumbago, which the discussant was able to relieve by sphenopalatine anesthesia, and whether there was a known pathway that would explain a distribution lower than the first thoracic Dr Kuntz's reply was as follows "The relief of the lumbar pain by anesthetizing the sphenopalatine ganglion is a remarkable thing I suppose it might have been a pelvic pain or any other No nerve connection can be pointed out by which that could be explained, but I have heard of it before Pain as low down as the lumbar region seems to have been relieved by anesthesia of the sphenopalatine ganglion I am sure we have no explanation for that at present"

Etiology

In reviewing the literature on painful muscular spasm, we note many suggestions concerning the cause of the condition, such as infection, fatigue, anoxia, toxic factors, neuritis, vitamin and chemical deficiencies, psychosomatic factors, trauma, overactivity of the autonomic nervous system, etc I fully agree with Gold that the contraction of muscle per se does not always cause pain and that when pain occurs in association with muscular contraction or spasm it is due to ischemia

resulting from prolonged spasm or abnormal pulls, tensions, or distortions of muscles with stretching or tearing of muscle fibers [8]

The cause of this painful condition is rather mysterious. Often it comes on like a thunderbolt from a clear sky without any history of trauma. Psychosomatic factors should not be overlooked These influences act through the vasomotor nerves that supply the blood vessels of the affected spastic muscles Stress and strain, fear and apprehension, cares and worries, unbalanced hormone activity, and metabolic changes are said to be causative factors The role of the adrenals, parathyroid, thyroid, pituitary, and other ductless glands must not be ignored The rapid reduction or depletion of the body's supply of calcium has something to do with muscular excitability and pain Vitamin deficiencies may also be underestimated

Sphenopalatine ganglion block was brought to my attention many years ago, and I confess that at that time I failed to recognize its value in the treatment of painful muscular and vascular spasm For thirty five years I was the victim of recurrent lumbosacral pain. These acute attacks occurred about once a year and lasted a week or ten days and sometimes longer I wore a heavy bulky sacroiliac brace during most of that time and tried every known form of treatment with little relief My last attack occurred on February 25, 1945, just as I completed a lengthy rectal operation As I rose from a sitting position, I suddenly felt excruciating pain in the left lumbosacral region. Sphenopalatine ganglion block was suggested, but at that time I could not understand the rationale of the treatment The pain became progressively worse, and I finally went to Dr Ruskin for treatment He blocked both sphenopalatine ganglia with a topical application of a local anesthetic, and the pain disappeared almost completely within twenty minutes Another block was given the next day and a third the day after The pain vanished entirely, and I was able to resume my practice. The relief obtained was really dramatic, and at the end of three years there has been no recurrence of pain My personal experience convinced me that this method is a promising new approach to the treatment of many spastic disorders However it is not a universal panacea, and no assurance of relief should be made if the painful spasm has an underlying organic cause

Procedure

Sphenopalatine ganglion block consists of a simple topical anesthetization of the sphenopalatine ganglion through the nasal route as follows (Fig 2) The tips of four fine flexible copper applicators or probes are covered with small bits of

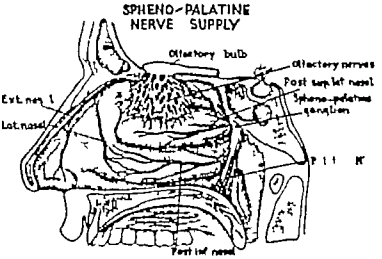


FIG 2 Nerve supply of the nasal cavity

cotton and dipped into the anesthetic solution A nasal speculum is inserted and the nasal cavity illuminated and carefully visualized (Fig 3) A cotton tipped applicator is passed along the upper border of the inferior turbinate bone and directed backward and downward until the upper posterior wall of the pharynx is reached Another applicator is directed along the upper border of the middle turbinate bone until the tip comes in contact with the body of the sphenoid bone about 1/4 inch external to the nasal septum (Fig 4) The same procedure is carried out on the opposite side. The four applicators are left in place for thirty minutes and then removed The applicators should never be forced into the nares as rough handling may damage the mucous membrane and cause pain

Case Reports

My series included a number of physicians who were treated and thus were in a position to evaluate the treatment They reported a sense of calm and relaxation with a sudden relief of spasm and pain The coughing test was painless in the lumbosacral cases Some of our patients complained of tenderness over the lower lumbar region resulting from prolonged spasm after the

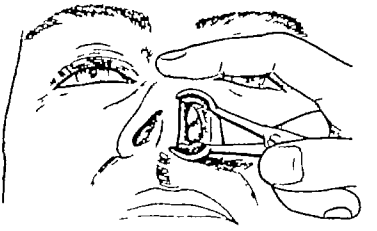


FIG 3 Nasal speculum in situ exposing middle and inferior turbinates.

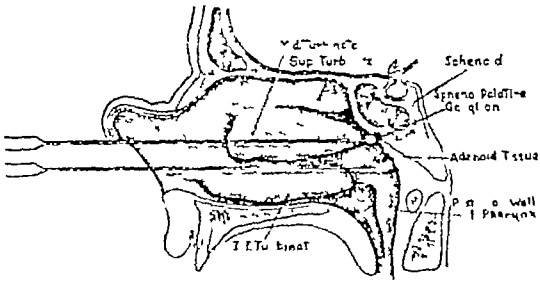


FIG 4. Anesthesia applied topically to sphenopalatine ganglion and posterior wall of pharynx.

conventional orthopedic treatment This myositis was greatly relieved by medication consisting of 2 grains calcium gluconate, 1½ grains papaverine, 5 grains novaspirin, and ½ grain caffein citrate in capsules (one capsule three times a day after meals), until muscular tenderness disappeared

The following is a brief description of a few outstanding cases

Case 1 —A. C , a man of fifty-four, suffered from persistent hiccough The patient had been seized with pain in the right loin radiating downward and forward, frequent and urgent urination, and dysuria A calculus was found blocking the right ureter which caused an acute hydronephrosis with pressure on the diaphragm The calculus was dislodged by Dr Greenberger Thereafter, the patient hiccoughed persistently for twelve days, and every known remedy, including blocking of the phrenic nerve, had been tried I blocked the sphenopalatine ganglia by topical application of 2 per cent pontocaine three times, at intervals of twenty-four hours After the third block, hiccoughing was completely controlled, and there was no recurrence

Case 2 —A. W , a forty-two-year old man, came to me with complaints of lumbosacral pain The patient, a physician, had suddenly felt severe pain in the lumbosacral region about ten days prior to his visit. He had been examined by an orthopedist, a neurologist, and a neurosurgeon, who attributed the pain to herniation of the third and fourth lumbar disks The routine palliative orthopedic treatment gave no relief, and operation was suggested When he came to me to seek relief from pain, he was actually carried into my office I told him that his case was not suitable for ganglionic block and that I was reluctant to attempt it. Finally, with the consent of the orthopedist and neurologist I agreed to treat him. The sphenopalatine ganglia were blocked with a 2 per cent pontocaine solution, and at the end of thirty minutes the patient was free from pain The following day he was able to take care of two obstetric cases and felt much better Pain did not recur until approximately two years after the first attack.

The second attack occurred while he was on vacation, and there was no history of trauma. It was much more severe than the first attack, the pain was so intense that he had to be lifted onto the treatment table The sphenopalatines were blocked as usual with a topical application of 2 per cent pontocaine Pain was relieved, and he went on a fishing trip the next day There has been no further recurrence

Case 3 —D L was a girl of twelve years suffering from acute torticollis On awaking one morning, the child complained of severe pain and muscular spasm over the right side of the neck She was immediately referred to me for treatment

She was in agony, with her head fixed to the right shoulder There was a stony hard contraction of the sternocleidomastoid muscle, and she could not move her head in any direction

A 2 per cent nupercaine solution was applied to the sphenopalatine gangha, and in less than half an hour the spastic pain was entirely relieved She left the office smiling and happy and has had no recurrence

Case 4 —I F , a man of fifty-five, was referred to me for treatment of herpes zoster, fifth and sixth right intercostal nerves This patient had been under a physician's care for approximately two weeks All the modern forms of therapy, including pituitrin, had been tried without success He complained of terrific pain over the right side of the chest and had a rash along the fifth and sixth intercostal nerves which was tender to the touch

Monocaine 2 per cent was applied to the sphenopalatine gangha, and within twenty-five minutes the pain was greatly reduced A second block was done the next day and a third and final block forty-eight hours later Complete relief of pain followed He was discharged happy and comfortable and resumed his usual work

Results In 103 Cases

My clinical experience with ganglionic block dates from March 1, 1945 Since then I have treated 103 patients (54 women and 49 men) between the ages of six and seventy-eight for various conditions (Table 1) This series seems sufficiently extensive to evaluate the therapeutic worth of the procedure

TABLE 1 —CONDITIONS TREATED WITH GANGLIONIC BLOCK

Condition	Number of Cases
Migraine	4
Acute torticollis	2
Painful spastic shoulder (subdeltoid and subacromial bursitis)	12
Intercostal neuritis	2
Herpes zoster	3
Persistent hiccough	4
Ureteral colic	5
Dysmenorrhea	3
Peripheral painful vascular spasm	7
Lumbosacral and sacroiliac pain	61
Total	103

In the 103 cases the treatment was used 327 times without any significant toxic reactions Those reported elsewhere were probably due to the use of some toxic anesthetic agent I have used various anesthetic agents, such as cocaine,

nupercaine, pontocaine, monocaine, etc, all of which, with the exception of cocaine, were found to be suitable Since two patients reacted poorly to cocaine, its use has been discontinued

Relief of pain and spasm was noted in approximately 90 per cent of my cases In the remaining 10 per cent some underlying organic condition was apparently responsible for the failure. In some cases the spontaneous relief of pain was really spectacular Immediate cessation of pain and spasm often occurred after the administration of one block In patients who were treated shortly after the onset of their symptoms In the early cases of lumbosacral pain there was a definite increase in the range of active and passive motion within thirty minutes after treatment Many sacroiliac patients who had been unable to turn from side to side in bed had less difficulty in rising or lying down

When the symptoms were far advanced and after the unsuccessful use of conventional orthopedic measures and physical therapy, the reaction was less dramatic Repeated ganglionic blocks were necessary, and convalescence was less rapid. In other words, the shorter the duration of the condition, the more rapid was the response. The majority of failures occurred in the advanced lumbosacral cases with complicating pathologic conditions.

These dramatic reports of the results of treatment by sphenopalatine block may sound fantastic, but they are true. The old saying "seeing is believing" still holds and these results must be witnessed in order to realize the full extent of the beneficial effects of this anesthetic procedure.

1882 GRAND CONCOURSE

Discussion

Simon L. Ruskin M D *New York City (Read by Jacob Brauower, M D)* —This marks the twenty fifth anniversary of my use of this procedure That quarter of a century has marked a rather stony path full of criticism from those who could not see a relationship between the autonomic center in the nose and muscle spasm. They were apparently not aware of the fact that the autonomic nervous system is a diffusely acting one and that an influence on any one of the major centers influences the entire autonomic system

The basic fact that the treatment actually did relieve the pain of muscle spasm did not seem to impress the physicians generally They seemed more interested in getting an explanation than a therapy Many of our therapeutic procedures today are still vaguely understood as to their mode of action and yet are in continuous and successful use. A great deal of mystery still surrounds the mode of action of sulfa drugs and penicillin but that has not withheld their wide application.

During the many years that I have used the sphenopalatine ganglion therapy a great deal has been learned regarding the pharmacology of the sympathetic, some of which I have described in my article, *The Control of Muscle Spasm and Arthritic Pain Through Sympathetic Block at the Nasal Ganglion and the Use of Adenylic Nucleotide* * I have learned to use a large number of alkaloids, as well as the various anesthetic agents One of the most useful has been atropine and among the local anesthetic agents a good deal of selectivity has to be exercised, depending upon the type of patient and the severity of the disturbance.

A number of years were also spent in studying the biochemical aspects of muscle spasm and in this work *the following basic things were discovered*

First a muscle in spasm is in the energy poor state and supplying a source for muscle energy speeds the recovery This can be accomplished speedily through the intramuscular injection of the adenylic nucleotide preferably as the iron salt and for this I use the preparation Irony!

Second to facilitate the conversion of carbohydrate to energy I use the coenzymes of the B complex, rather than the synthetic B complex preparations In the form of the preparation, Co-Amino which has the coenzymes of the B complex and the amino acids.

Third I use the sphenopalatine ganglion block which reduces the rate of nerve impulses to the spastic muscle and increases the mechanical efficiency of the muscle. The influences on the sympathetic can also be enhanced by the intramuscular injection of calcium ascorbate Calcorbate which I have found much more effective than calcium gluconate.

I avoid all of the sedatives since they diminish the oxidation capacity of the blood and prolong the duration of illness. I also do not give any aspirin Where there has been prolonged chronic infection I prescribe the iron ascorbate Ferro-C one tablet three times a day to increase the oxidation-reduction properties of the blood and facilitate the energy exchange. These suggestions have proved their value over a series of many years and are eminently worthwhile

M J Madonick, M D, Bronx —When a new treatment is introduced it is essential that all diagnoses be established as definitely as possible Pain in the lumbosacral and sacroiliac regions is of frequent occurrence but its cause is not easy to determine The diagnosis of lumbosacral and sacroiliac strain although often made is not too clear a concept to me Perhaps some of these cases are really instances of protruded intervertebral disks The relief of pain in the patient with a protruded disk described by Dr Amster is significant. However many more such patients would have to be treated to exclude chance improvement, since spontaneous remissions in protruded disks as well as in other radiculitides, occur fairly often Another factor to consider in pain is the psychologic one. There are tremendous differences in the threshold of pain in different individuals and also in their responses to therapy A series of cases with back

* Am. J Digest Dis (Oct.) 1946

pains on a conversion hysteria basis should have infiltrations of the sphenopalatine ganglion to determine how they respond to this form of treatment and whether this type of thrapy acts suggestively

It would be interesting to follow the cases presented by Dr Amster to find out whether they have recurrences and, if so, whether they would again respond to sphenopalatine ganglion infiltration or topical anesthetization

Julius F Neuberger, M D, *New York*.—I am very much interested in Dr Amster's presentation, as a number of years ago I read a paper at the New York Academy of Medicine on this subject Being a nose and throat specialist, I was interested only in cases of hay fever, asthma, and vasomotor rhinitis As chief of the Eye, Ear, Nose and Throat Department of the U S Naval Hospital in Newport, I had a great many service people come under my observation for treatment of hay fever In addition to injection, I treated a great many of them by local application with pads of pontocaine and also a solution of cocaine and adrenalin The pads were applied around the area of the sphenopalatine ganglia The results were often astounding I went further with my experiments and injected the sphenopalatine ganglia directly by breaking through the nose or through the sphenopalatine foramen, using 70 per cent alcohol My results were even better than with the pads In injecting the alcohol I used a few drops of pontocaine first for anesthesia Some of the cases of asthma were either markedly improved or even stopped altogether I presented some of these cases at the Academy of Medicine when I read my paper, and some of the doctors who are here today saw them at that time

I think that there is a great deal to be discovered and to be learned about the sympathetic nervous system, its physiology and pathology, and I think that a great deal of research will be done in the not too distant future

J Lewis Amster, M D, (*Closing*).—Regional anesthesiology and therapeutic nerve block are still in their infancy The introduction of new local anesthetic agents with nontoxic reactions for the prolonged relief of pain and the newer methods of their application should be encouraged We have come to realize that painful impulses are transmitted through the sympathetic nervous system, that stress and strain play an important part in overstimulating the sympathetic nervous system with the production of painful vasoconstriction and painful muscular spasm, that the sphenopalatine ganglion is linked with the superior cervical ganglion, and that sphenopalatine ganglionic block administered early in the course of painful muscular or painful vascular spasm is capable of interrupting the sympathetic pathways and relieving pain

References

1 Amster J Lewis Dutchess Cty Caduceus 2 2,7 (June) 1944
2 LeRiche Rene Surgery of Pain Baltimore Williams & Wilkins Co, 1939, p 38
3 Labat, Gaston Tr Am. Soc Regional Anesthesia December 13, 1932 p 1
4 Neuberger Julius F Presented at a meeting of the American Society of Regional Anesthesia May 28 1945
5 Sluder, Greenfield J A M A 61 1201 (Sept. 27) 1913
6 Ruskin, Simon Arch Otolaryng (1926)
7 Kuntz Albert Presented at a meeting of the American Society of Regional Anesthesia, 1936
8 Cornell Conferences on Therapy NEW YORK STATE J MED 45 2086 (Oct 1) 1945

TO ESTABLISH PITTSBURGH HEALTH CENTER

The University of Pittsburgh has announced acceptance of a $13,600,000 gift from the A W Mellon Educational and Charitable Trust for the establishment of a world-leading industrial and occupational health center

The center will form the nucleus of a new Graduate School of Public Health and will be one of only eleven such institutions in the United States and Canada

Chancellor Rufus H Fitzgerald simultaneously announced the appointment of Dr Thomas Parran, former Surgeon General of the United States Public Health Service, as the dean of the new school He will assume the position immediately One of the organizers of the World Health Organization in 1946, he retired as surgeon general early this year

Paul Mellon, Mrs Ailsa M Bruce, and Donald D Shepard, trustees of the Mellon trust, said the graduate school will emphasize occupational and industrial health and hygiene and basic research in all phases of public health But its goal will be to attain "world leadership" in fields of preventive medicine

Under the agreement with the university, an initial $4,000,000 will be given the school to obtain "outstanding" men to administer the school and to assure adequate faculty and teaching facilities An additional $1,600,000 will be given for operating and equipment expenses and development costs during the first five years of operation

The trust will donate not more than $5,000,000 for the construction of the school, its laboratories and facilities, but only after the school is accredited by national scientific authorities for the granting of degrees of Doctor of Public Health and Master of Public Health, and university medical science schools and Pittsburgh hospitals have effected a program of integration

ERYTHEMA MULTIFORME

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THE data presented in this paper are based on the study of 150 cases of erythema multiforme admitted to Bellevue Hospital during the twelve-year period from 1936 to 1948 Actually, there were 127 individual patients in the series Of these, 120 patients were hospitalized once, while the remaining seven were hospitalized a total of 30 times, as shown in Table 1

TABLE 1.—NUMBER OF PATIENTS AND ADMISSIONS

Patients	127
Hospital admissions	150
Single admissions	120
Multiple admissions	7

Types of Erythema Multiforme

It was obvious at the outset that an analysis of the cases would not be of value if studied as a single group, as the clinical features varied greatly from case to case In some patients, the disease was mild and of short duration, while in others it ran a septic course often lasting for many weeks. Involvement of the skin and mucous membranes was as variable as the constitutional reaction. At times, the skin alone was affected, while at other times the mucous membranes of the oral cavity and genitalia were involved simultaneously Infrequently, lesions also appeared on the conjunctivae In a few cases the skin was unaffected, the mucous membranes being the only sites of involvement. The eruptions often simulated pemphigus vulgaris, urticaria, purpura, dermatitis herpetiformis, lupus erythematosus disseminatus, erythema nodosum, and secondary syphilis.

The patients frequently gave a history of drug ingestion upper respiratory infection, or gastrointestinal disturbances. Pyogenic infection, the bite of a wasp and trauma appeared to be significant in a few cases There was obvious association with such diseases as rheumatic fever, rheumatic heart disease, Sydenham's chorea erysipelas vaccinia, and in one instance, giant follicular lymphadenopathy

From this mass of confusing clinical material it was soon evident that some cases had a number of factors in common and could be separated from the entire group to form fairly distinct types. In this respect, we have followed the general suggestions of Ormsby and Montgomery [1] In addition to the five types which they describe, a small number of our cases appeared to belong to a sixth type described in the literature under such titles as ectodermosis erosiva pluriorificalis by Klauder febrile type of erythema multiforme by Leopold and erythema bullosum malignans-pluriorificial type by one of us [2–4] This last type is usually referred to as Stevens-Johnson disease [5]

In the remainder of this paper, we will refer to the mild cases as erythema multiforme of Hebra, who first described this group as a distinct entity [6] Cases difficult to differentiate from pemphigus vulgaris will be referred to as erythema multiforme pemphigoides These two types are grouped together with the Stevens-Johnson type, since the causes of all three remain obscure The remaining cases are referred to as erythema multiforme accompanying infectious diseases when it is associated with a known infection (erythema multiforme accompanying visceral diseases when it appears to be associated with such conditions as rheumatic disease), and finally, as erythema multiforme of drug causation [7–10] Of these types the cause is definitely established only in the last mentioned since in this group the disease can be reproduced almost at will following administration of the known toxic agent or drug

General Incidence

In Table 2 is shown the annual incidence of the various types of erythema multiforme observed at Bellevue Hospital Of the entire group of 150 cases, 90 cases (63 3 per cent) were of the Hebra type, 10 cases (0 6 per cent) were of the pemphigoid type 6 cases (4 per cent) were of the *Stevens-Johnson type 3 cases (2 per cent) accompanied infectious diseases, 20 cases* (13 3 per cent) accompanied visceral diseases, and 16 cases (10 7 per cent) were caused by drugs or other toxic agent Altogether, the Hebra pemphigoid and Stevens-Johnson types, the three types of unknown cause consisted of 111 cases, 74 per cent of the total

Seasonal Incidence

Erythema multiforme of the Hebra type was most prevalent during the spring and early summer, although cases occurred throughout the year, as shown in Table 3 The greatest number of cases developed during July and there was a

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TABLE 2.—ANNUAL INCIDENCE OF ERYTHEMA MULTIFORME AS OBSERVED AT BELLEVUE HOSPITAL FROM 1936 TO 1948

Types of Erythema Multiforme	1936	1937	1938	1939	1940	1941	1942	1943	1944	1945	1946	1947	Total
Hebra	8	7	9	4	7	9	5	5	2	19	9	11	95
Pemphigoid	3				1	1	1			2	1	1	10
Stevens-Johnson type				1		2		3					6
Accompanying infectious diseases	1											2	3
Accompanying visceral diseases	2		3	5	6				2		2		20
Of drug causation, etc.	1		2		1	1		1		6	2	2	16
Total	15	7	14	10	15	13	6	9	4	27	14	16	150

slightly higher incidence during December and January than during September, October, and November This was somewhat surprising as this disease was considered to occur more frequently in the spring and the fall Three of the ten cases of the pemphigoid type developed during April, the others occurring during the remainder of the year Erythema multiforme accompanying visceral diseases was most prevalent during December, although cases were also seen throughout the year As was expected, erythema multiforme caused by drugs was distributed throughout the year.

Average Age, Sex, and Race

Table 4 lists the average age of the patients and their distribution as far as sex and race are concerned The Hebra type occurred in patients from six to seventy-six years of age but was more frequent during the third and fourth decades The average age was thirty-seven It appeared to be more common among men, almost twice as many men being affected as women Nearly one third of the cases occurred in Negroes The pemphigoid cases averaged fifty-one years of age, significantly higher than the average age of the Hebra type. The sexes were equally affected Only one pemphigoid type was seen in a Negro In the cases associated with visceral diseases, although the average age was twenty-five, half the patients were children under the age of fifteen The incidence among men was slightly higher than women Only one patient in this group was a Negro, a forty-nine-year-old woman with acute rheumatic fever

Altogether there were 43 Negroes in the entire group, indicating a susceptibility approximately equal to the white race, a finding quite at variance with that of Noojin and Callaway, in whose group of 40 patients no Negro was affected [11]

The occupation of the patients appeared to have no significance Altogether, 46 occupations were noted Most of the patients were students (21), housewives (19), or laborers (12)

The national origin also appeared to have little significance Of the 127 patients, 88 were Americans, while the rest came from ten European countries, Canada, Puerto Rico, and the British West Indies No Chinese was admitted for this disease, although a considerable number reside in New York City However, while it would appear that the disease is rare among them in this city, it is not at all uncommon in China.[12] It is interesting to note that eight of the eleven patients, whose eruptions were associated with rheumatic diseases, were of Italian extraction.

Only one American was affected in the pemphigoid group This was of interest as Americans predominated in all other groups The other

TABLE 3.—MONTHLY INCIDENCE OF ERYTHEMA MULTIFORME AS OBSERVED AT BELLEVUE HOSPITAL FROM 1936 TO 1948

Types of Erythema Multiforme	Jan.	Feb	Mar	Apr	May	June	July	Aug	Sept.	Oct.	Nov	Dec	Number of Patients
Hebra	8	4	9	8	10	13	14	5	6	6	4	8	95
Pemphigoid	1	1	1	3	1	1	1					1	10
Stevens-Johnson type		1		1	1						1	2	6
Accompanying infectious diseases	1				1		1						3
Accompanying visceral diseases	3	2	2	2		3	1	1			1	5	20
Of drug causation etc.	2	3	3	2	1			2	1	1	1		16
Total	15	11	15	16	14	17	17	8	7	7	7	16	150

TABLE 4.—AVERAGE AGE, SEX, AND RACE OF PATIENTS

Types of Erythema Multiforme	Number of Patients	Average Age	Sex		Race	
			Male	Female	White	Negro
Hebra	95	37	62	33	66	29
Pemphigoid	10	51	5	5	9	1
Stevens-Johnson type	6	26	6	0	4	2
Accompanying infectious diseases	3	22	3	0	1	2
Accompanying visceral diseases	20	25	11	9	19	1
Of drug causation, etc.	16	35	11	5	8	8
Total	150	33	98	52	107	43

eight patients in this group originated from Russia (2), Poland (2), Austria (2), Hungary (1), and Ireland (1) Five of the nine patients were Jewish.

Erythema Multiforme of the Hebra Type

Hebra observed in 1854 that a group of dermatoses hitherto described as erythema papulatum, erythema annulare, erythema tuberculatum, erythema iris, and erythema gyratum, were actually all variations of a single disease, which he entitled erythema multiforme. He described it as an essentially self limited disease which ran its course in from one to four weeks. In addition to mild subjective symptoms and a tendency to recur, a characteristic eruption of multiform character usually developed upon the extensor surfaces of the extremities. Kaposi and Schwimmer broadened Hebra's concept when they included bullous forms of the disease.[13 14]

In the group of patients under study, 95 were of this type. In 70 patients, the illness began with the appearance of the typical skin eruption. The remaining 16 patients began with symptoms of a mild respiratory infection (11), gastrointestinal symptoms (4), or rheumatic pains (1) from one to fourteen days prior to the appearance of the rash. Toxic symptoms occurred in 49 patients. The most common symptoms were slight fever, headache, general malaise, nausea, vomiting, sore throat, and chills. Less frequently there were cough, arthralgia, abdominal pain, weakness, hoarseness, diarrhea, and generalized aching

Cutaneous Features —The eruption favored the extensor surfaces of the upper and lower extremities, the face, and the neck. It was usually symmetric in arrangement and frequently generalized. The skin was affected in the following order of frequency lower extremities, upper extremities, face and vermilion border of lips, neck, genitalia, trunk, palms, dorsum of hands, soles, inner thighs back, and chest

A decided tendency to polymorphism was the rule. Frequently, there occurred various sized patches of erythema, macules, papules, vesicles, and bullae. At times, the bullae were hemorrhagic. When coalescent vesicular lesions ruptured, large crusted eczematous patches developed, particularly on the extremities. Iris lesions were fairly common. Urticarial lesions were occasionally seen. Other lesions appeared typically purpuric.

Vesiculobullous eruptions were frequently seen in this group This was to be expected in a hospital series, as only the more serious cases of erythema multiforme are generally admitted to the wards. Sixty-two of the 95 cases developed vesicles or bullae at some time during the course of the disease Thirty-one patients had cutaneous and oral involvement, 22 patients developed lesions of the genitalia either at the onset or later on Occasionally, a patient was seen with either mouth or genital lesions alone, without involvement of the cutaneous surface at any time. Eleven patients had mild to moderately severe accompanying conjunctivitis

Thirty three patients complained of cutaneous discomfort, such as pruritus, burning, or tenderness. The remaining patients had no discomfort as far as the skin was concerned. Staining or hyperpigmentation was frequently noted after the lesions had healed but usually disappeared after a time, except in many of the Negro patients.

The majority of the patients had few complaints except as already noted Usually there was a low grade temperature ranging between 99 and 100 F for a variable period from one to fifteen days with an occasional higher elevation. In a rare case, the temperature continued for thirty days Twenty patients had no elevation of temperature. The average period of hospitalization was eighteen days for the Hebra type of erythema multiforme.

Laboratory Findings —Slight elevation of the leukocyte count occurred in half the patients. The differential leukocyte count was normal as a rule. The erythrocyte count averaged 4 500, 000 and the hemoglobin averaged 12.3 Gm. Urinalyses were for the most part normal No abnormalities were found in the blood nonprotein nitrogen, urea nitrogen, creatinine, chlorides calcium phosphorus, sodium, potassium, or total protein in the few patients who had chemical examination of the blood. Blood cultures were negative in six patients examined. Culture of contents of the bullae showed staphylococci. Smears of bullous fluid usually revealed the presence of many polymorphonuclear leukocytes, a few lymphocytes, and, rarely, an eosinophil

Associated Diseases —In the group, there were three patients with diabetes mellitus, three patients with syphilis (two latent and one with nodular gummata), five patients with gonorrhea, three patients with active pulmonary tuberculosis, and one patient each with the following rosacea, stasis dermatitis, asthma, tinea cruris, and postpoliomyelitis paralysis. Erythema nodosum was associated with erythema multiforme in two patients. Trauma apparently played a significant role in three patients Ten patients were chronic alcoholics and in four of these the disease began during periods of prolonged imbibition. According to Keil, chronic alcoholism may predispose to erythema multiforme.[15]

Noncutaneous Physical Findings —Sixteen patients revealed evidence of infection of the upper respiratory tract. Seven patients had poor

dental hygiene Generalized lymphadenopathy was found in seven patients The liver was enlarged in nine patients, three of whom were alcoholics The spleen was enlarged in three patients

Treatment—The efficacy of treatment is difficult to evaluate when the disease in question is self-limited This is certainly true of erythema multiforme in which it is impossible to foretell how long the toxic symptoms or the efflorescence will persist in a particular case. Treatment has usually been symptomatic Analgesics, antipyretics, sedatives, hypnotics, and cathartics of every description have been administered Locally, many lotions, ointments, and medicated baths have also been used

In 1938, chemotherapy with the sulfonamides was added to the usual symptomatic medications and found to be of no specific value Large doses of vitamins, particularly the various factors of the vitamin B complex, were administered, possibly because in many cases the mouth lesions suggested general debility, pellagra, or some other vitamin deficiency This type of therapy was ineffective In recent years, penicillin has been administered Although it is of value for the secondary infections that occasionally develop, it has not been found to have any favorable influence upon the course of the disease Antihistamine drugs such as benadryl and pyribenzamine were used in a few cases They did not prevent recurrences or relapses, and lesions spread in spite of their administration There were no deaths in this type of erythema multiforme

Erythema Multiforme Pemphigoides

Cases of erythema multiforme are occasionally seen which resemble pemphigus vulgaris very closely and, because of this striking similarity, are referred to as pemphigoid This term has also been employed to describe the severe bullous eruptions which sometimes follow smallpox vaccination or the ingestion of certain drugs [16] We prefer, however, to classify such cases as of either infectious or of drug origin and reserve the term pemphigoid for cases of unknown causation Among our patients, there were ten examples of this type or about 7 per cent of the entire group

Mode of Onset—The disease began in nine patients with the appearance of cutaneous lesions In the tenth patient, painful mouth lesions developed first and were present for a week before the skin became affected Fever was usually present from the onset

Cutaneous Features—The eruption in all patients consisted of vesicles and bullae Usually, the bullae were surrounded by an erythematous halo, but in three patients they arose from normal skin They tended to rupture early with the formation of crusted lesions Grouping, iris lesions, and a positive Nikolsky sign were observed in several patients

In the majority, the lesions were roughly symmetric and generalized Excluding the mucous membranes, the most common locations were the face, dorsum of the hands and forearms, the neck, the torso, and the lower extremities The palms and soles were not affected except in two patients who developed erythema and desquamation in these areas rather late in the course of the disease

Usually, severe itching, burning, or a combination of both occurred, either at the onset or during the course Three patients had no discomfort referable to the skin

Mucous Membrane Lesions—Involvement of the oral mucous membranes occurred in six patients The lesions consisted of irregular areas of erythema, millet-sized vesicles, ruptured bullae, and superficial erosions of the soft palate, tongue, cheeks, and pharynx Dried crusts and fissuring were seen on the vermilion border of the lips in several patients Mild conjunctivitis with mucopurulent exudate occurred in three patients In two women, pea-sized erosions developed on the labia

Constitutional Symptoms—The prodromal symptoms, which were commonly seen in the other types of erythema multiforme, especially the Stevens-Johnson type, were strikingly absent in all the pemphigoid cases Loss of weight, strength, and appetite did not occur in this group There were few systemic symptoms other than moderate fever and general malaise

Clinical Course—Moderate fever occurred in eight of the ten patients in this group and was usually present from the onset In general, these patients were hospitalized for longer periods and developed higher temperatures than the patients with the Hebra type The temperature usually ranged from 102 to 104 F persisting from two to six weeks

Despite the extent of the eruption, the mucous membrane involvement, and the prolonged fever, the patients did not feel too ill Recovery appeared to be spontaneous, the course hardly being affected by therapy The average period of hospitalization was thirty-seven days, twice as long as that of patients with the Hebra type

Laboratory Findings—The leukocyte count was usually normal or slightly increased A 9 per cent eosinophilia was seen in one patient Moderate secondary anemia was usually present The Pels-Macht test in five patients was inconclusive, being reported as follows 54 per cent, 75 per cent, 59 per cent, 31 per cent, and unsatisfactory

Complications and Mortality—Secondary pyogenic infection of the bullae occurred occasionally, and in one patient a cellulitis of the elbow developed There were three fatalities among the patients in this group Their advanced age (eighty five, seventy-three, and seventy five) and general debility were no doubt contributory Two of these patients developed terminal bronchopneumonia.

Recurrences—Five patients gave a history of recurrent attacks One patient had four attacks over a thirty-five-year period Another patient had an eruption which had persisted for eight months, new lesions developing while old ones healed A third patient had frequently recurring vesicles and bullae of the oral cavity over a period of six years. In two patients, there was a history of only two attacks

Treatment—As with the Hebra patients, treatment was mainly symptomatic For the relief of cutaneous discomfort, potassium permanganate baths, vaseline gauze with acriflavin (1 3,000), wet dressings, soothing lotions, and bland ointments were often utilized. Opening the bullae for the relief of pruritus was a routine procedure. Large doses of vitamins, particularly vitamin C and vitamin B complex were usually administered None of the following proved to be of any value desoxycorticosterone injections, a course of rabies vaccine, injections of sodium thiosulfate and sodium gluconate, Fowler's solution, carbarsone sulfapyridine and autohemotherapy

Differentiation from Pemphigus Vulgaris—It was important from the point of view of prognosis to differentiate the pemphigoid cases from pemphigus vulgaris This was always difficult and, in some cases, almost impossible A diagnosis of erythema multiforme pemphigoides was clear-cut in only two of the patients in this group

In the other patients, a diagnosis of pemphigus vulgaris was entertained either upon admission or during the course of the disease. One patient had, in fact, been treated as a case of pemphigus vulgaris, but upon readmission with a recurrence four months later, the diagnosis was changed to erythema multiforme pemphigoides Other factors which suggested a relationship between the two conditions were the following (1) seven patients originated from eastern Europe, (2) five patients were Jewish, (3) the mortality rate was high and (4) most of the patients were in late adult life

On the other hand certain clinical observations made a diagnosis of erythema multiforme pemphigoides more tenable. First, although eruption was extensive in four patients, there were no mouth lesions Loss of weight strength, and appetite did not occur Lesions not usually seen in pemphigus vulgaris, such as areas of erythema without bullae, purpura, and erythematopapular and iris lesions, were observed Severe pruritus was common Scalp lesions, on the other hand, were rarely seen

A fulminating pemphigoid eruption with rapid generalization accompanied by the symptoms described above favors the diagnosis of erythema multiforme pemphigoides rather than pemphigus vulgaris, which, as a rule, becomes generalized only after a period of at least several months.

Stevens Johnson Type of Erythema Multiforme

Various authors have called attention to a rare clinical syndrome which is characterized by abrupt onset with symptoms suggesting an acute respiratory infection with marked prostration and elevation of the temperature and accompanied by the simultaneous development of edematous areas of erythema of the skin and vesiculobullous lesions of the mucous membranes [3-4] Coalescent vesicles and bullae soon develop upon the erythematous areas and tend to rupture within a few days, producing extensive bright red areas of denudation especially around the mouth, eyes, nose, anus, and genitals Usually, there is involvement of the bulbar and palpebral conjunctivae which become suffused and edematous The eyelids are often stuck together by a crusted, greenish-yellow, purulent exudate, and erosions, ulcerations, and scarring of the cornea may result in partial or complete loss of vision. The disease usually runs a fulminating course for about two weeks when the temperature finally falls In many respects, it resembles an acute infectious disease and for this reason is usually admitted to a contagious disease hospital with such diagnoses as chickenpox, diphtheria, smallpox, Vincent's angina, vaccinia, scarlet fever, measles, impetigo bullosa and pemphigus vulgaris In a recent report, the senior author described 33 cases with a mortality of 18 per cent. Six of our patients were of this type.

Mode of Onset and Course—In all six patients the disease began suddenly with marked elevation of temperature, severe constitutional symptoms, and general malaise. Among the symptoms noted were rhinitis sore mouth, sore throat, cough, difficult respiration chills, generalized aching, abdominal pain or discomfort nausea vomiting profuse salivation sore eyes with lacrimation and purulent discharge headache, and weakness Mastication and deglutition were painful Fresh bullae continued to appear for a week or two in most cases The patients ran a continuous temperature, ranging between

101 and 103 F from one to two weeks, marked improvement in the symptoms and mucous membranes and cutaneous lesions appearing at this time The cutaneous lesions were usually healed in from three to five weeks Hospitalization averaged twenty days There were no deaths among these patients

Cutaneous Features—Of the six patients, five had a generalized vesiculobullous eruption The sixth patient had bullous lesions confined to the mouth and vermilion of the lips but eventually developed bullae of the palms two weeks after onset of the illness Eye and mouth involvement occurred in all the patients In four patients there was involvement of the genitalia as well The bullae were usually flat, somewhat flaccid, and were superimposed upon various sized patches of erythema and edema They were from pea- to palm-sized and tended to rupture early, forming crusted and eroded areas particularly over the lips, penis, and scrotum Iris lesions with or without central bullae were seen in three patients

Mucous Membrane Lesions—In addition to the severe constitutional symptoms which characterize this type of erythema multiforme, mucous membrane lesions are invariably present The eyes and mouth were always affected—the nasal mucous membranes and the lips in five patients, the pharynx in three patients, the anus in one patient The eyes usually showed moderate to severe injection of the palpebral and bulbar conjunctivae, mucopurulent or purulent discharge, blepharitis, and edema of the eyelids The patients complained of pain and burning of the eyes and lacrimation The nasal mucous membranes and the pharynx were usually swollen and inflamed Hemorrhagic crusts and purulent nasal discharge were also observed The lips were often dry, swollen, fissured, and covered with hemorrhagic crusts and ulcerations The buccal mucous membranes were usually inflamed, the gums were edematous and bled easily Erythematous patches, bullae, and denuded areas covered with a white or gray exudate were often seen in the mouth

Laboratory Findings—A slight leukocytosis was usually present, varying from 10,000 to 15,000 The differential leukocyte count was normal Occasionally, there was a slight shift to the left The erythrocyte count and the hemoglobin were usually normal Albumin, pus cells, and granular casts were found in the urine at times

Complications—One patient developed lobar pneumonia but recovered rapidly with sulfonamide therapy Secondary infection of the bullae was occasionally seen Hyperpigmentation usually remained after the lesions healed

Treatment—Treatment was mainly supportive and directed against the various constitutional symptoms presented by the patient The oral lesions were treated with saline or medicated mouth irrigations Boric acid irrigations, argyrol, and 1 2,500 metaphen solution were used for the eyes Petrolatum and boric acid ointment were frequently applied to the lips and eyelids to soften the crusts Analgesics and antipyretics were administered for pain and fever Sulfanilamide and sulfapyridine were given to two patients and appeared to be helpful, but this is difficult to evaluate, as the other patients recovered without the use of sulfonamides Large doses of thiamine chloride, riboflavin, nicotinic acid, vitamin B complex, and vitamin C were administered to four patients Penicillin was not utilized in these cases as it was not available for civilian use at the time It is of undoubted value in preventing secondary infections particularly of the respiratory tract Serious eye complications may also be prevented by the prompt use of penicillin

Erythema Multiforme Accompanying Infectious Diseases

Occasionally, erythema multiforme is seen accompanying such diseases as typhus fever, malaria, cholera, glanders, measles, and septicemia Apparently, other infections may also be a factor In one of our patients, a typical eruption appeared during an attack of erysipelas, and in the other patient who was admitted twice, vaccination against smallpox was responsible Cases following vaccinia have been reported in the literature and were seen frequently following the mass vaccination of New York City residents in April, 1947 The case following vaccination was unusually severe and prolonged and is described below because of these and other unusual features

Case 1—Postvaccination—C M, a Negro boy, age fourteen, was admitted to Bellevue Hospital on June 9, 1947, with a diagnosis of dermatitis of unknown cause The patient had been successfully vaccinated on April 28, 1947 Two weeks later, a vesiculobullous eruption appeared on the neck and spread quickly to involve almost the entire body surface and the mouth Admission temperature was 101 8 F, and the patient complained of headache, malaise, and sore mouth The temperature was septic in type for eleven days and fluctuated from 99 to 104 F For another eleven days it remained about 101 F, finally becoming normal on the twenty-fourth hospital day After three days of normal temperature, it again rose and for four days assumed a septic character, once more with a daily elevation to 104 and 105 F New bullae continued to appear throughout the entire period of hospitalization until the temperature became nor-

mal for the second time The lesions finally healed leaving residual hyperpigmentation, and the patient was discharged on July 15 1947 thirty-six days after admission. Throughout the illness, there were no physical findings, other than the eruptive manifestations in the skin and mucous membranes

Urinalysis revealed a slight trace of albumin and occasional pus cells. The leukocyte count was 7 600 and the differential count was normal The erythrocytes numbered 4 000 000 and the hemoglobin was 12 Gm. The leukocytes increased to 13,050 while the temperature was septic and there also occurred a shift to the left at this time the polymorphonuclear leukocytes increasing to 81 per cent The leukocyte count became normal a week before the patient left the hospital and an erythrocyte count indicated a fall to 3 270 000 Treatment consisted of forcing fluids, high protein and vitamin diet, and aspirin for the first few days. The bullae were opened under sterile precautions and acriflavin-vaseline gauze was applied Penicillin was administered from June 14 to 27 (25 000 units every three hours) but fever and malaise persisted and bullae continued to develop Sulfapyridine and benadryl were then administered and the temperature finally declined However despite these two drugs, the temperature again became elevated on July 8 and medication was discontinued. A second course of penicillin was then administered.

The patient was readmitted on August 1, 1947 two weeks later and ran a course similar to that already described until discharge on August 20 During the relapse the mouth was not affected The patient felt fairly well despite the high temperature and the generalized eruption The appetite remained good, and there was no loss of weight or strength As before penicillin was administered for eleven days and sulfathiazole was substituted later on The patient was discharged in good condition

Erythema Multiforme accompanying Visceral Diseases (Osler)

Attention has been directed by many investigators to the association of erythema multiforme with organic disease of the heart, lungs gastrointestinal tract, bony articulations, and other body tissues [9,16,19] The significance of this relationship is still unknown

Rheumatic fever and the accompanying involvement of the heart joints and nervous system was the most frequently observed associated disease.

Type of Eruption —Most frequently the eruption consisted of sharply circumscribed areas of erythema, either flat or elevated about 1/2 to 1 cm in diameter The color varied from pink to dusky or bluish-red At times, the centers were pale, more rarely a deeper shade of red than the periphery In several patients the lesions coalesced, and a picture of erythema marginatum developed when the central areas faded Although the lesions were usually discrete several patients developed diffuse blotchy various sized, irregular areas of erythema. The eruption had a predilection for the extensor surfaces of the extremities and was usually symmetric Generalization of the eruption was not seen. Lesions did not appear in the mouth or on the genitalia Vesicular or bullous lesions did not occur [20] In the average case the eruption appeared rapidly, evolved without cutaneous discomfort, and disappeared, usually within four or five days In most of the patients a history of frequent recurrences could be obtained

Systemic Features —For the most part the patients in this group were severely ill with elevated temperature, acute polyarthritis or symptoms of congestive heart failure. In some patients symptoms of an acute upper respiratory infection or gastrointestinal disturbance developed one to two weeks before the appearance of the efflorescence

Laboratory Findings —The only significant laboratory findings were moderately rapid erythrocyte sedimentation rate in all patients and evidence of kidney disease in about half the patients the urine containing albumin casts and red and white blood cells The leukocyte count was usually normal or slightly elevated *Throat cultures revealed presence of hemolytic* streptococci in three patients and Streptococcus viridans in one patient. Blood cultures were sterile in three patients

Erythema Multiforme of Drug Causation

Strictly speaking, the cases caused by drugs should be classified as dermatitis medicamentosa erythema multiforme type This type is comparatively rare in hospital practice Among 329 patients admitted to Bellevue Hospital for drug eruptions from 1936 to 1948 only 15 cases of this particular type were observed In the entire series under study, 48 of the 150 patients gave a history of drug ingestion prior to the appearance of the eruption. In only these 15 cases however did we feel that the drug was the actual cause The following drugs were implicated sulfonamides (five cases) antipyrine (three cases) phenolphthalein (two cases) penicillin, aspirin, quinine arsenic and turpentine (one case each) The eruption was vesiculobullous in those cases caused by the antipyrine, phenolphthalein quinine, turpentine and in four of the five cases caused by *sulfonamides*. One patient developed his eruption immediately following the bite of a wasp and perhaps does not definitely belong in this group His eruption however was typically multiforme in character and is therefore included although the appearance of several lesions and his rapid recovery suggested an acute urticarial reaction It should be noted in passing that urticarial lesions are occasionally ob-

served during the course of erythema multiforme and has been noted by many investigators including Engman, Osler, and others [7,8]

Summary and Conclusions

1 One hundred fifty cases of erythema multiforme were observed on the dermatologic wards of Bellevue Hospital from 1936 to 1948

2 Approximately 1 per cent of the patients admitted to these wards had some type of erythema multiforme

3 The cases were separated into six types on the basis of their clinical characteristics or because of an association with a definite disease or when the cause was unknown

4 They were listed as follows (1) Hebra type, 95 cases, (2) pemphigoid type, ten cases (which at times closely simulates *pemphigus vulgaris*), (3) Stevens-Johnson type, six cases, (4) those cases accompanying certain infectious diseases, three cases, (5) those cases associated with rheumatic fever, the visceral type, 19 cases, and (6) those cases caused by drugs or toxins, 19 cases

5 An effort has been made to differentiate the pemphigoid type of erythema multiforme from the fatal disease, pemphigus vulgaris, on a purely clinical basis

6 The serious ophthalmologic complications of the Stevens-Johnson type are emphasized It can, as a rule, be differentiated from the pemphigoid type by the presence of prodromal symptoms which are always absent in the latter

7 The eruption occurring in the rheumatic cases of the visceral type is distinctive in our series in that vesicles and bullae were not observed Patchy areas of erythema were the usual findings

8 Dermatitis medicamentosa of the erythema multiforme type may be indistinguishable from the Hebra and the pemphigoid types, and it is occasionally confused with the Stevens-Johnson type

9 In the interest of accurate medical records, which may later be used for statistical purposes as in this report, we suggest that charts of the patients with this type be labeled dermatitis medicamentosa (name of drug), erythema multiforme type

10 Of the 329 patients admitted for dermatitis medicamentosa (1936 to 1948), 15 patients, or 4 8 per cent, were of the erythema multiforme type

11 Drugs and infections have been advanced as the precipitating or predisposing cause of three types The causes of the Hebra, pemphigoid, and Stevens-Johnson types are still obscure A virus has been suspected in the Stevens-Johnson type

12 It is obvious from the considerations set forth here that an accurate laboratory method would be an invaluable aid in differentiating erythema multiforme pemphigoides from pemphigus vulgaris

13 The salicylates are of some value in the Hebra type, penicillin injections aid in preventing secondary infection, especially in the Stevens-Johnson type Otherwise, the treatment is symptomatic and supportive

Discussion

Frank C Combes, M D, *New York City* — I heartily endorse the authors' classification of this confusing group of polymorphous erythemas which they have prepared from personal observation of a large number of cases

The term "erythema" has always been loosely and indiscriminately applied by dermatologists Fundamentally, it means an abnormal redness of the skin due to capillary congestion Nevertheless, there are included such diverse conditions as erythema intertrigo due to friction and erythema induratum due to the tubercle bacillus—neither condition remotely resembling the other etiologically, pathogenically, clinically, or therapeutically

Erythema multiforme, as has been pointed out, is one of these confusing entities which, in my opinion, might better be included in the "dermatitis group" In fact, Jadassohn, almost half a century ago, recommended an appropriate name for it, "dermatitis erythematosa multiformis." The only reason I hesitate to endorse this term is that our nomenclature already abounds with unwieldy, clinically descriptive names Some of our designations in the erythema group have already been improved upon, as witness tuberculosis indurativa for erythema induratum and dermatitis contusiformis for erythema nodosum

As the authors have told us, we should not glibly make a diagnosis of erythema multiforme without a searching inquiry as to its cause Even the statistics they have given us impress me that their number of the "Hebra type" is larger than it should be Remember that this type is idiopathic It constitutes a dumping ground or a place where one may affect the appearance of erudition and cloak his ignorance beneath the questionable protection of that euphonious term "erythema exsudativum multiforme Hebrae"

Doctor Fred Wise prefers to limit use of the term erythema multiforme to the Hebra type and erythema nodosum, excluding all the many forms of the polymorphic and multiform varieties which are not "idiopathic" Here, however, we encounter difficulties based on cause and pathogenesis

Some may think Stevens-Johnson disease should not be included, others might desire to exclude the bullous types of dermatitis medicamentosa However, I think the authors have full justification for their classification as offering a firm basis for further study of this group of diseases from a differential diagnostic viewpoint and are to be congratulated on their presentation

References

1 Ormsby, O S. and Montgomery, H: Diseases of the Skin, 7th ed., Philadelphia, Lea & Febiger 1918 p 152
2 Blauder J S.: Arch. Dermat & Syph 36: 1067 (Nov.) 1937
3 Leopold, J S Am. J Dis Child 59 1098 (June) 1940.
4. Costello, M J J Invest. Dermat. 8: 127 (Mar) 1947
5. Stevens, A. M., and Johnson, F C.: Am J Dis Child. 24: 536 (Dec.) 1922.
6. Heiss, F Diseases of the Skin London New Sydenham Society 1896, vol 1 p. 285
7. Lagman, M F., and Weiss, R S: Arch. Dermat. & Syph. 12 3–5 (Sept) 1925.
8. Osler W: Am J M Sc. 127:1 (Jan) 1904
9 *Ibid* 110: 6–9 (Dec) 1895
10 Osler, W Brit. J Dermat 12: 227 (July) 1900
11 Noojin R O., and Callaway J L.: Arch Dermat. & Syph 54: 560 (Nov) 1946.
12. Reiss, F: Personal communication.
13. Kaposi, M Pathologie und Therapie der Hautkrankheiten, 3rd ed., Vienna and Leipzig, Urban and Schwarzenberg, 1887 p 301
14 Ziemssen, H. Handbook of Skin Disease New York, William Wood & Co., 1885 p 370
15 Keil H Ann. Int. Med 14: 440 (Sept.) 1940
16 Eichenlaub L. J: South. M J 19: 186 (Mar) 1926
17 Walker N: Brit. M J 1 120 (May 18) 1901
18 Lewin G: Berl klin Wchnschl 13: 34 (1876)
19 Galloway J: Brit M J 2 121 (July 18) 1903
20 Keil H Ann. Int Med. 11: 2273 (June) 1938

SOLAR BURNS OF THE FUNDI

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PROLONGED action of visible rays of light may cause dazzling lacrimation, blepharospasm, pain, and disturbances in vision. It is well known that intense radiant energy has an injurious effect upon the eyeball, causing tissues to become inflamed and irritated Fortunately, many heat rays are absorbed by the water in the media, so that the deeper structures of the eyeball are protected by its natural moisture As the retina is free from sensory nerves, pain is caused by the action of light upon the cornea iris, and ciliary body According to Vogt, only 20 per cent of heat rays reach the retina.[1]

The spectrum of any source of light contains both visible and invisible rays Adjoining the red end of the spectrum are the invisible infrared or heat rays and beyond the violet end are the invisible short ultraviolet rays It is the latter which are chemically active According to Duke-Elder, visible light rays which are absorbed by the eye may produce one of three effects visual thermal, or photochemical (abiotic) [2 3]

Heat and light rays unite to focus upon the retina and there may develop into intense heat It is like focusing a strong lens on a match which it can actually ignite.

Verhoeff and Bell in 1916, Duke-Elder in 1926, and other workers have produced lesions experimentally by exposing the eye to infrared rays [4,2 3] Recently, Berens and McAlpine reported two cases of solar keratoconjunctivitis associated with amblyopia.[5]

Reflections from water, sand, or snow, or prolonged looking at the sun, an eclipse, strong electric lights or flames in a furnace may produce damage at the macula so that minute vision such as reading or sewing, is permanently impaired

During the past four years, I have observed five cases of burns of the retina. Three were seen within a few days after exposure to strong sunlight The other two were seen four to six hours after exposure to sunlamps All five complained of pain, photophobia, and lacrimation, and all had conjunctival injection to a varying degree several hours after exposure Three were young women eighteen twenty-one and twenty-seven years old, respectively Two were men, thirty nine and forty-eight years of age Their general health and vision was excellent prior to the retinal burn The women gave a history of direct and prolonged exposure to the sun, one while in Florida, and the other two during the summer months at the Long Island beaches One man, while answering the telephone during a sunlamp treatment, removed his sunglasses. The exposure lasted about ten minutes Three hours later his vision was reduced to fingers at three feet. The corneas were steamy and showed punctate staining The following day his vision was 20/70, and the corneal edema had cleared up The fundi showed no visible pathology His peripheral fields, tested with a 5-mm. white test object were uniformly contracted. This condition returned to normal in ten days and vision gradually improved to 20/30 but a relative central scotoma remained in each eye

Presented at the Third Congress of Ophthalmology Havana January 8, 1948.

Of the four other cases, three were seen from eight to ten days after exposure to direct sunlight All complained of early lacrimation and blurred vision At the time of the examination, the eyeballs were not injected, and the central and peripheral fields were quite normal In one case gray punctate spots were seen surrounding the macula All four cases had reduced vision (20/70 to 20/40) which cleared up in about two weeks, but a relative central scotoma remained in four cases, and in one a small absolute scotoma for green was present This interfered greatly with reading or sewing

Summary

According to Parsons, all visible rays and some infrared rays pass unimpeded to the retina [6] Much of this radiation is absorbed by the pigment epithelium, and it is probable that the pathologic changes are produced by the resultant heating effect An early examination with the ophthalmoscope may reveal nothing pathologic, or a pale spot, surrounded by a brownish ring, may be seen at the fovea Later, there may be pigment deposits and a small gray punctate spot around the fovea, and this may be replaced by a hole

There may also be seen a generalized grayness of the retina, temporal to the disk, surrounding a small hemorrhage Some believe this pathology to be a localized vasospasm of the retinal arterioles and capillaries initiated by thermal or infrared rays This is believed to be followed by a compensatory dilatation producing increased capillary permeability, severe edema, autolysis or actual necrosis of the retina, and finally a hole in the macula

The prognosis should be guarded Even though improvement may occur, a positive scotoma with permanent impairment in vision usually results

It is obvious that the public should be enlightened as to the dangers of prolonged exposure to sunlight and the careless use of sunlamp treatments without adequate protection to the eyes

65 CENTRAL PARK WEST

References

1 Vogt A F O 81 99 155 (1912)
2 Duke-Elder Lancet 1 1137 1188 1230 (1926)
3 *Ibid* 2 16 (1926)
4 Verhoeff and Bell P Am Acad Arts & Sciences 51 630 (1916)
5 Berens C and McAlpine P T Am J Ophth 27 227 (Mar) 1944
6 Parsons Diseases of the Eye New York Macmillan Co 1927

OLD AGE MAKES GOOD

Horatio Alger, prototype of the "go-getter" businessman, would have much more difficulty in adapting himself to business and industry today than he did in yesterday's fiction, Dr Anthony J Lanza, director of the Institute of Industrial Medicine of the New York University-Bellevue Medical Center, said recently

Basing his remarks on a recent survey among leading business executives of some of the nation's top firms, Dr Lanza said that the elderly worker has come into his own, and now holds a distinct advantage over the youngster

"Executives almost unanimously agree that the teen-ager and worker in his '20's has less stability, pays less attention to responsibility, and is absent more often," he reported "On the other hand, one firm, with more than 100 active persons over 65 years of age on its payroll, graded less than 10 per cent as 'unsatisfactory' workers"

Uncertainties of the future, coupled with postwar readjustments, were cited as contributory factors to youth's record

"O GOD! O KINSEY!"

A contributor to *The Lancet* has thus hymned the Kinsey report

O cupid! Cast away your bow and quiver—
Statistics prove your method inexact
O Donne! Go take a jump into the river
You hymned the essence, but ignored the fact

Locked in some cool aseptic heaven above,
Trained statisticians painlessly inquire
Into the quaint geometry of love,
The quantitative aspects of desire,
Observe the conduct of the lovesick male
(Not passionate, not noble, not obscene),
And plot it on a logarithmic scale,
Noting a random scatter round the mean

O monumental volume, smug and fat!
Did Man, who wrote the Song of Songs, write that?
O God! O Kinsey! O Jehoshaphat!

—Time, September 27, 1948

NEWER ASPECTS OF CLINICAL ELECTROCARDIOGRAPHY

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TO THE uninitiated the syllables formed by P-Q-R-S-T, which is the alphabet of electrocardiography, are often regarded as precise pronouncements to which more familiar and less exact methods of clinical observation must need defer The electrocardiograph is to be sure, a precision instrument, but it does not follow that the information it supplies is accordingly precise The development of clinical electrocardiography has been largely empiric, various patterns having been found to be associated with specific pathologic states The fundamental studies of Wilson and his coworkers from which so many recent contributions derive, and recent observations employing endocardial and unipolar extremity leads have helped to place electrocardiography on a sound physiologic basis [1-3] It is our object to translate this newer knowledge of electrophysiology of the heart into terms of direct clinical interest and to show how an appreciation of a few fundamentals helps in the interpretation of conventional electrocardiograms

The electrical activity of a single isolated muscle fiber or nerve bears a remarkable resemblance to the clinical electrocardiogram, i e a QRS complex representing excitation or in terms of the physiologic membrane depolarization, and an S-T interval and T deflection representing repolarization or return to the resting state Our physiologic knowledge of the T wave is in the realm of hypothesis, for it is subject to the most varied influences In the isolated fiber, T is oppositely directed to the QRS, whereas clinically it is most often in the same direction Understanding of the QRS complex, the excitation wave, is somewhat more substantial however A brief consideration of the derivation of the QRS helps one to visualize and to understand what occurs in the various leads in health and in disease. It will suffice to mention one electrical phenomenon, namely, that current traveling toward a point of registration is recorded as a positive deflection.

Genesis of the Ventricular Complex

One recalls that excitation of the ventricles occurs via the specialized conduction system the impulse traveling with great speed from the auriculoventricular node through the bundle of His dividing in the interventricular septum into the left and right bundle branches which then ramify as the Purkinje network through the subendocardial regions of both ventricles almost simultaneously (Fig 1) Thence the impulse spreads directly through the ventricular walls externally Since current traveling toward a point of registration is recorded as positive and current traveling away from a point of registration is negative, an electrode placed outside the left ventricle, whether it be directly epicardial or on the surface of the body, as at the apex or left arm, will record a positive ventricular complex (an R spike and positive T), whereas an electrode placed in the interior of the heart will record a negative ventricular complex (a Q deflection and negative T) Since the major impulse travels away from the right arm (there being no ventricular wall facing the right arm but rather the aorta and pulmonary artery), a right arm electrode records a negative potential similar to the interior of the ventricular cavity Interestingly enough, leads over the right ventricle (which in electrocardiographic terminology correspond to the V_1 and V_2 position on either side of the sternum) also record a predominantly negative deflection, much as though the right ventricle did not exist at all and very much resembling leads from the interior of the right ventricle The reason for this as is apparent from the anatomic cross section of the heart illustrated in Fig 1 is that the muscle mass of the right ventricle is but a small fraction of that of the left

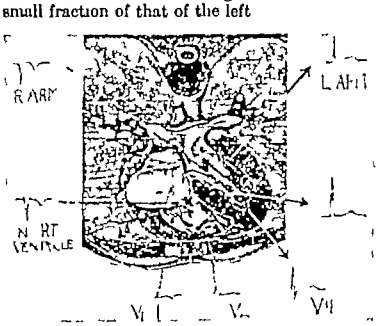


FIG 1 Cross section of chest through heart illustrating the appearance of the ventricular complex at various points.

Presented at the 140nd Annual Meeting of the Medical Society of the State of New York, New York City General Sessions, May 19 1948.

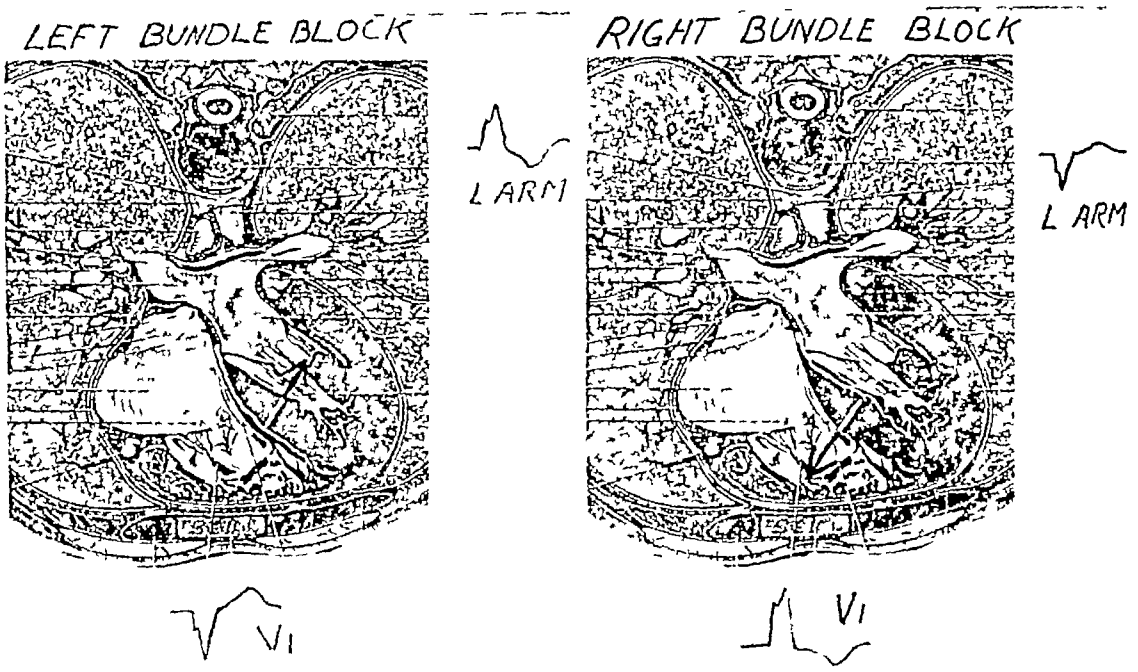


FIG 2 Derivation of the ventricular complex in bundle branch block.

The conclusion is inescapable, as we have indicated elsewhere, that the right ventricle contributes but negligibly to the normal electrocardiogram [9] Even in right ventricular hypertrophy the characteristic changes are produced by rotation of the heart rather than by increased muscle mass, and it is only in extreme right ventricular hypertrophy (as in tetralogy of Fallot) that the greatly thickened right ventricle produces a large positive deflection in precordial leads in the V_1 and V_2 positions over the surface of the right ventricle The small positive deflection normally observed in the V_1 and V_2 positions (Fig 1) is due not so much to the right ventricle as to the fact that the earliest activation of the ventricles occurs on the left side of the interventricular septum so that, for a brief hundredth of a second or so, the predominant excitation wave is traveling to the right from the left side of the septum and is recorded as a small R wave in the V_1 and V_2 positions Thereafter, the impulse travels internally through the septum equally from both sides, and the opposite vectors oppose and cancel one another so that the interventricular septum, a large muscle mass though it be, normally contributes very little to the electrocardiogram Since neither the right ventricle nor the interventricular septum under normal circumstances contribute significantly to the electrocardiogram, one arrives at the important conclusion that the ventricular complex represents chiefly the electrical activity of the free wall of the left ventricle

In bundle branch block, however, the interventricular septum becomes the determining factor in the electrocardiographic pattern (Fig 2) Thus, in right bundle block the impulse now travels unopposed from the left to the right side of the septum Consequently, leads over the surface of the right ventricle (V_1 and V_2) exhibit an upright (and due to the aberrant conduction pathway, a wide and notched) QRS, and a lead from the left arm, which in effect may be regarded as the conventional lead 1, exhibits a downward deflection, i e , right axis deviation Conversely, in left bundle branch block the impulse travels unopposed from right to left, and the V_1, V_2 leads reveal a negative QRS while the left arm (or lead 1) shows a positive QRS

Derivation of Unipolar and Standard Limb Leads

Normally, the position of the heart is such that the free left ventricular wall (which, as mentioned, is the major determinant of the ventricular complex) faces the left arm and to a lesser degree the left leg (Fig 3) The ventricular complex accordingly is upright in the left arm unipolar lead and to a lesser extent in the left leg unipolar lead The right arm potential, it is recalled, is always negative since it faces the ventricular cavities The standard limb leads are merely the summation of the unipolar extremity leads Lead 1 is the left arm potential minus that of the right arm, subtracting the negative right arm potential results in augmenting the positive left arm potential in forming lead 1 Lead 2 repre-

sents the left leg potential minus that of the right arm, and again, since one subtracts a negative quantity, the potential is positive Lead 3 is the left leg potential minus that of the left arm, and so if the left arm potential exceeds that of the left leg, the subtraction results in a negative lead 3 potential, i e., slight left axis deviation One sees that the unipolar extremity leads are in effect, interchangeable with the standard limb leads and merely another way of expressing the same potential vectors From the limb leads we can derive arithmetically the unipolar limb leads and vice versa The unipolar leads employed by Wilson and by Goldberger help one to understand the derivation of the limb leads and more explicitly indicate positional variations of the heart, but it should be emphasized that they contribute little information of clinical significance which is not obtained in the standard leads [7 8] Their chief practical application is in the differentiation of the normal from the pathologic Q wave, to be mentioned presently

To return to positional variations of the heart when the heart lies transversely the left arm potential is more strongly positive, and the left leg now not faced by the free left ventricular wall, has a small or negative potential Lead 1 consequently is strongly positive, and lead 3 is decidedly negative, i.e left axis deviation. Conversely, when the heart lies vertically, the free left ventricular wall now faces the left leg, and the ventricular cavity and great vessels face not only the right arm but the left arm as well Consequently, the left arm as well as the right exhibits a negative potential and the left leg a strongly positive deflection There results, therefore, a low or inverted QRS in lead 1 and upright QRS in lead 3, i e , right axis deviation

Q Waves and Infarction

These considerations help one to understand the derivation of Q waves the hallmark of infarction The Q wave, as Wilson has shown is not a new wave due to the infarct itself it is merely a recording of the normal negativity of the interior of the ventricular cavity resulting from the fact that an area of dead ventricular muscle under the recording electrode no longer transmits an excitation wave toward the electrode and forms, as Wilson has put it, a window from the interior of the left ventricle Thus, in typical anterior infarction near the apex an apical lead in the V_3 V_4, or V_5 position will exhibit a deep Q and inverted T (Fig 4) If the infarct extends up high along the left ventricular wall, the window will point to the left arm and one obtains a deep Q in lead 1 as well If the anterior infarct extends into the lower septum, the window faces the precordium in the V_1 and V_2 positions and one records a deep Q in the V_1 and V_2 positions

In posterior infarction the window most frequently points to the left leg, and a Q and inverted T is recorded in the left leg lead or in lead 3 If the posterior infarct is high, the window may not point to the left leg but posteriorly, and a Q may be detected only in esophageal leads as Nyboer has shown [10] This is not a routinely feasible procedure, and we have found that it is quite satisfactory to record the activity of the back of the ventricle with an electrode placed over the lower left chest posteriorly just above the diaphragm and below the left scapula In certain

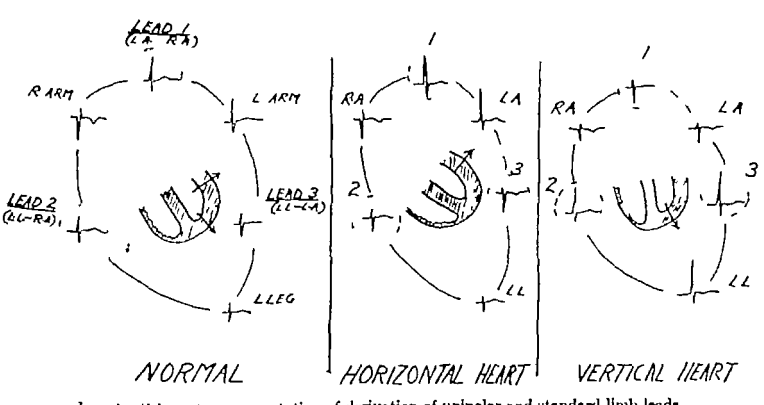


FIG 3 Schematic representation of derivation of unipolar and standard limb leads.

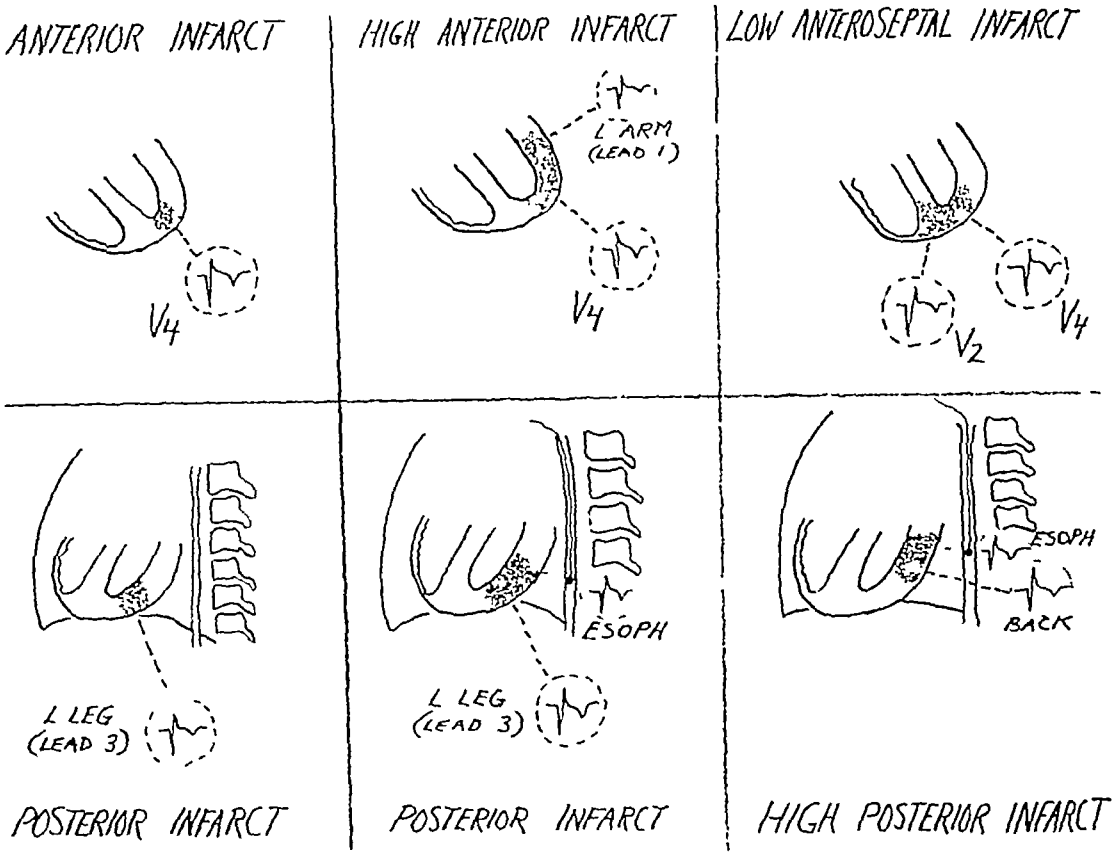


FIG 4 Derivation of Q waves in infarction.

cases of posterior infarction a definite Q will be detected which is not present in the unipolar left leg lead or in lead 3 (Fig 5) Leads from higher levels of the back, above the level of the left ventricle, normally exhibit a Q and inverted T

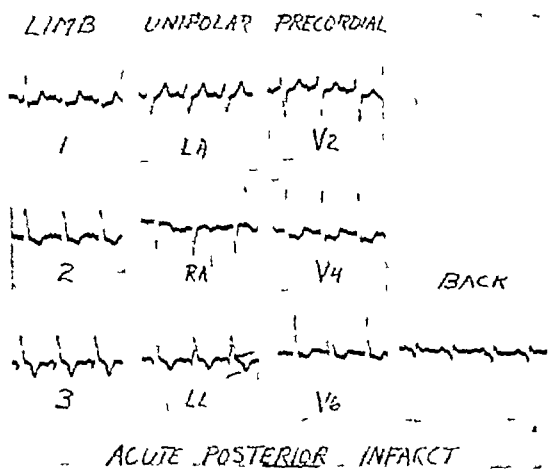


FIG 5 Acute posterior infarct. A lead from the lower left chest posteriorly reveals a definite Q wave, in lead 3 and in the unipolar left leg lead only a small Q is observed In high posterior infarcts the "window" faces posteriorly and may not face the leg

One sees, therefore, that in a real sense it is possible to map out the location and extent of the infarct The electrocardiogram has been employed principally for the diagnosis of infarction but it is of value prognostically as well in indicating the extent of infarction This becomes of some therapeutic importance since large infarcts particularly are an indication for anticoagulant therapy in view of the heightened occurrence of mural thrombosis and embolization In a recent study we found very definite differences in the electrocardiographic patterns in a group of 50 subjects with acute, initial, fatal attacks of coronary occlusions as contrasted with 50 subjects who survived the attack [11] Certain electrocardiographic features were found to occur preponderantly in the fatal cases and relatively infrequently in the surviving cases In anterior infarction these included deep Q wave in lead 1, the aBB (low R_1, deep S_2, S_3) pattern, and bundle branch block. These patterns are very commonly observed in ventricular aneurysm which is a sequel to extensive anterior infarction When such changes occurred in surviving cases of anterior infarction, they were usually transitory Fatal cases of posterior infarction exhibited a much greater frequency of marked S-T segmental deviation, particularly marked depression in precordial

leads, bundle branch block, and T changes in leads 1 and precordial leads, in addition to the usual Q_3, Q_3, T_3, T_3 pattern In addition to these changes which appear to indicate extensive infarction, other findings occurred preponderantly in the fatal group Among these were electrocardiographic characteristics of combined anterior and posterior infarction, progressive changes other than the usual serial S-T and T evolution, electrical alternans very low voltage of the QRS complex, prolongation of the Q-T interval, depression of the P R interval, and P changes suggesting associated auricular infarction, major arrhythmias such as auricular fibrillation, ventricular tachycardia and heart block, and sinus tachycardia exceeding 110

Among fatal cases of acute myocardial infarction over eighty per cent exhibited one or more of the findings described, while in surviving cases the majority presented the simple anterior or posterior pattern. No significant difference was found in the incidence or mortality of anterior and posterior infarction per se It is evident that one can offer a much better prognosis in acute coronary occlusion when the electrocardiogram reveals the simple pattern of anterior or posterior infarction than when additional abnormalities, such as Q waves over a wide area or additional features we have mentioned, are present.

The Q wave which is such an important sign may be produced by mechanisms other than infarction, particularly in lead 3 Differentiation of the normal from the pathologic Q_3 is an important and very frequent problem A Q_3 not due to infarction may occur when the heart is horizontally placed as in obese individuals or in pregnancy The accentuated positive deflection in the left arm translated into lead 3 becomes a strong negative deflection appearing as a deep S or as a Q wave. This is even more frequently the case in hypertension where the thickened left ventricle produces a strongly positive deflection in the left arm It is worth emphasizing that hypertension with left ventricular hypertrophy is the commonest cause of the deep Q_3. It is in the differentiation of this type of Q_3 from that due to infarction that the unipolar extremity leads have greatest value [12–14] The Q_3 due to infarction produces a Q wave in the left leg lead, whereas this does not occur in the Q_3 due to transverse position of the heart or left ventricular hypertrophy

Ordinarily, the unipolar leg lead is not necessary to differentiate the Q_3 due to infarction, for there are other stigmata in the standard leads which aid in this differentiation. In a study carried out on a large number of subjects with a deep Q_3 divided into three groups—normal insurance applicants hypertensive individuals, and cases receiving disability due to prior posterior infarction—certain findings were shown to aid in the differentiation of the normal Q_3 from the Q_3 due to coronary disease [15] The following were found to be present in 10 per cent or less of normal individuals with a Q_3 conforming to Pardee's criterion but occurred at least three times as frequently in subjects with a Q_3 due to coronary disease. These included the following (*a*) weight less than 5 per cent overweight (*b*) absence of S wave in lead 1, (*c*) Q wave exceeding 1 mm in lead 2, (*d*) low T wave in lead 2 (less than 1 mm), (*e*) wide Q wave in lead 3 (0 04 second or more in duration), (*f*) Q wave in lead 3 which equals or exceeds 75 per cent of the amplitude of the tallest R in the limb leads, and (*g*) deep inversion of the T wave in lead 3 (exceeding 2 5 mm.)

In order of importance the features which were most significant of an abnormal Q_3 were found to be a low T wave in lead 2 the presence of a Q in lead 2 which exceeded 1 mm in amplitude and an absence of an S wave in lead 1 Employing the six electrocardiographic criteria (*b–g*), it was found that 94 per cent of patients with a Q wave in lead 3 due to coronary artery disease exhibited one or more of these abnormalities while only 24 per cent of normal subjects with a Q_3 conforming to Pardee's criterion showed one or more of these findings The presence of one or more of these abnormalities in the standard limb leads usually offers a satisfactory means of distinguishing the so-called normal from the pathologic Q wave in lead 3 If one has a unipolar lead attachment (and the newer machines come equipped with unipolar leads), it is desirable to take a left leg lead, for in a certain number of cases the standard limb leads are indecisive in tracings with a Q_3.

Precordial Leads

What of the precordial leads? Here too, a multiplicity of leads has been recommended Were one to follow the many individual recommendations the complete electrocardiogram would comprise thirty or forty or more leads an impractical and superfluous technic The conventional single precordial lead in the 4 position (left midclavicular line) is usually adequate, but there is no doubt that multiple precordial leads are preferable, and we routinely employ the 2 4, and 6 positions When infarction is suspected the six positions across the precordium should be explored. In arrhythmias we have found the CR_1 or CR_2 lead to be very valuable for this lead records auricular activity particularly well, and we have observed cases of supraventricular arrhythmias such as auricular flutter, which could be analyzed clearly only in the CR_1 or CR_2 lead,

the standard limb leads or other precordial leads failing to record visible auricular activity

There has been much controversy as to whether it is best to employ the unipolar Wilson V chest lead, the paired chest extremity CR (chest-right arm), or CF (chest-left leg) lead Usually, the remote extremity potential is so much less than the chest potential that for all practical purposes CF and CR leads are very similar to unipolar V leads An important exception occurs in vertically placed hearts where the large potential going to the left leg (since in such circumstances the left ventricular wall faces the left leg) may cause the appearance of spurious T wave inversions in the CF lead It is this factor which accounts for the fact that the precordial CF lead may exhibit an inverted T in children and slender asthenic adults, whereas if a V or CR lead is taken the T is normally upright In general, the CF lead is more apt to be abnormal than the V or CR lead We have observed definite cases of anterior infarction revealed in CF leads where V or CR leads were normal If precordial leads are recorded in recumbency and during expiration, spurious abnormalities in the CF lead are less apt to occur, for under such circumstances the left ventricular wall faces the left leg to a lesser degree and the leg potential is accordingly smaller If one encounters abnormal CF leads, it is advisable to do further study with serial precordial leads in the 1 to 6 positions and also record unipolar V precordial leads The CR leads are of less value than V or CF leads, apart from use of the CR_2 lead in studying arrhythmias as has been mentioned

We ought not leave the important subject of precordial leads without emphasizing the importance of correctly positioning and indicating the precordial lead whether it be V_4, CF_4, or CR_4 If the electrode is placed too high on the chest or near the sternum instead of at the 4 position, spurious T wave inversions occur, causing a mistaken diagnosis of myocardial disease This is an extremely frequent error, particularly committed by technicians who, in taking tracings on obese females, fail to have them undress and do not properly place the electrode beneath the breast Slight changes in the position of the precordial electrode cause marked variations, and it is essential that the precordial electrode be properly placed if serial comparisons are to have any validity If electrode jelly is spread over a wide area of the precordium or if the patient is perspiring freely, the potential recorded is not confined to the area under the electrode and variable changes, particularly in the T waves, may be observed [16] One further spurious abnormality in electrocardiography should be mentioned Subjects with vertically placed hearts often show a low T in lead 1 and inverted T in leads 2 and 3 These abnormalities which may be construed as indicating myocardial disease disappear in recumbency

Cardiac Hypertrophy

We have already mentioned that the right ventricle contributes but negligibly to the electrocardiogram The same is true in right ventricular hypertrophy when in extreme hypertrophy only a large R spike may be recorded over the surface of the right ventricle in the V_1 or V_2 position accompanied by a deep S wave in the V_5 and V_6 positions The well-known pattern of right ventricular strain in the limb leads, i e , right axis deviation, depressed ST, and inverted T in leads 2 and 3, is not due to hypertrophy as such but to clock wise rotation of the heart around the vascular pedicle In consequence the ventricular cavity comes to face not only the right arm but the left arm as well, just as in vertical position of the heart The left arm potential becomes negative, resulting in an inverted QRS in lead 1, i e , right axis deviation We have also been able to show that rotation does this by rotating the electrodes on the surface of the body in the opposite direction (right arm electrode above scapula, left arm electrode in left midclavicular line), producing right axis deviation in the same manner as when the heart is rotated instead It must be evident that the right ventricle cannot contribute significantly to the standard limb leads, for it faces anteriorly and there are no appreciable electrical vectors directed toward the extremities The rotation of the heart which causes the pattern of right ventricular strain apparently is caused by hypertension of the pulmonary circuit Thus, in acute pulmonary embolism right axis deviation may develop very quickly where there can be no question of right ventricular hypertrophy Only a minority of cases with pulmonary embolism exhibit the McGinn-White pattern of deep S_1 and Q_3, when it occurs, we may assume that acute pulmonary hypertension is present [17] The various nonspecific changes often observed in pulmonary embolism, such as T wave changes, are due to coronary insufficiency resulting from shock, as Horn, Dack, and Friedberg have shown [18]

The fact that the pattern of right ventricular strain is produced by rotation of the heart rather than by hypertrophy as such explains why it is impossible to distinguish whether right axis deviation is due to hypertrophy or vertical position of the heart This is important clinically, for conditions producing right ventricular hypertrophy and cor pulmonale, such as pulmonary fibrosis and emphysema, also result in vertical position of the heart as the diaphragm descends

The electrocardiogram offers little help, therefore, in the diagnosis of early right ventricular hypertrophy, and, unfortunately, neither do roentgen methods

Characteristic electrocardiographic changes are observed in auricular hypertrophy consisting of increased amplitude, broadening and notching of the P waves, and frequently auricular arrhythmias *such as extrasystoles, flutter, and fibrillation.* Electrocardiographic evidence of auricular hypertrophy however, is late, and almost always when well developed P wave changes are present, fluoroscopy will reveal definite auricular enlargement with the aid of the esophagram Widening and notching of the P waves, although indicating auricular hypertrophy in younger age groups, are of no diagnostic value whatever in older individuals, since we have found such P wave changes very commonly in older subjects in the absence of auricular hypertrophy

While the electrocardiogram is not too helpful *in detecting early right ventricular or auricular* hypertrophy, it is of inestimable value in detecting left ventricular hypertrophy and is, as we have shown more sensitive than roentgenologic methods In a study of 940 cases reported a few years ago, we established specific criteria for the early diagnosis of left ventricular hypertrophy [10] Left ventricular hypertrophy may be considered to be present when left axis deviation occurs in association with any of the following changes

1 Increase in amplitude of the QRS complex best expressed by the sum of R_1 and S_3 Hypertrophy is present if this sum exceeds 2 5 millivolts and is probably present if it is over 2.2 millivolts The increase in voltage is the earliest electrocardiographic change in hypertrophy R_1 of 16 mm or over is similarly significant

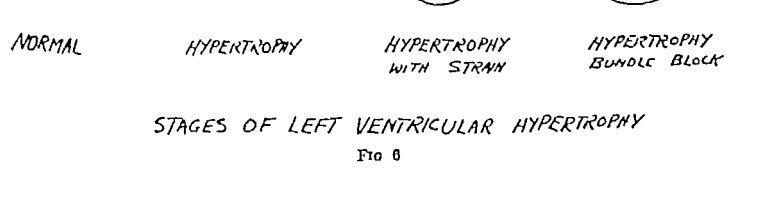
2 Any perceptible depression of the ST segment in lead 1, even in as slight degree as 0 5 mm (0 05 millivolt)

3 Lowering of T_1 below 1 mm. or further degrees of abnormality of T_1

The changes in the ST segment and the T wave may develop in the absence of left axis deviation and left axis deviation is not an invariable or necessarily integral part of the electrocardiographic pattern *of left ventricular hypertrophy* The usual occurrence of left axis deviation with left ventricular hypertrophy in hypertension is due largely to predominant obesity with transverse position of the heart, which in itself causes left axis deviation. In slender subjects with left ventricular hypertrophy left axis deviation is not so often observed

The increased amplitude of the QRS complex may most reasonably be attributed directly to an increased mass of left ventricular musculature (Fig 6) with an increased potential directed to the left arm (lead 1) The changes in the ST segment and the T wave are due to relative ischemia of the deeper layers of the left ventricle This is occasioned by increased work of the heart without commensurate increase in coronary flow Several factors contribute to cause this disproportion.[19]

The particular vulnerability of the subendocardial region of the left ventricle is due to an intramyocardial pressure gradient during contraction During systole there is a marked increase in intramyocardial pressure in the deeper layers of the left ventricle which exceeds aortic pressure and which obstructs coronary flow in this region, although there is no interference in coronary flow in the outer zone of the left ventricle or in the right ventricle or auricles where the intramyocardial pressure does not rise above the arterial pressure The subendocardial region of the septum and the left ventricle, on this account,



STAGES OF LEFT VENTRICULAR HYPERTROPHY

FIG 6

is the area most vulnerable to ischemia It is the site of predilection of myocardial disease when there is a relative insufficiency of coronary flow, as in hypertrophy, or when there is an absolute decrease in flow, as in coronary artery sclerosis and acute coronary artery occlusion This factor helps explain the infrequency of infarction and ischemic changes in the right ventricle and auricles as contrasted with the left ventricle

Over a long period, the chronic subendocardial ischemia leads to irreversible changes, and replacement fibrosis occurs This involves the Purkinje distribution network of the left bundle branch which ramifies in the subendocardial region of the interventricular septum and the left ventricle Interference with left ventricular excitation caused by diffuse involvement of the conduction system leads to slurring, notching, and widening of the QRS complex, eventually progressing to the pattern of left bundle branch block, which is frequently encountered in association with long-standing and advanced left ventricular enlargement (Fig 7) The widening of the QRS complex is only in slight part attributable directly to increased thickness of the left ventricular myocardium This is perhaps the commonest background for the development of left bundle branch block It must be emphasized, however, that bundle branch block, whether left or right, does not necessarily signify extensive heart disease, for it may result from a small scar in the conduction system, or may be due to a congenitally aberrant conduction mechanism as in the Wolff-Parkinson-White syndrome of bundle block associated with a short P-R interval

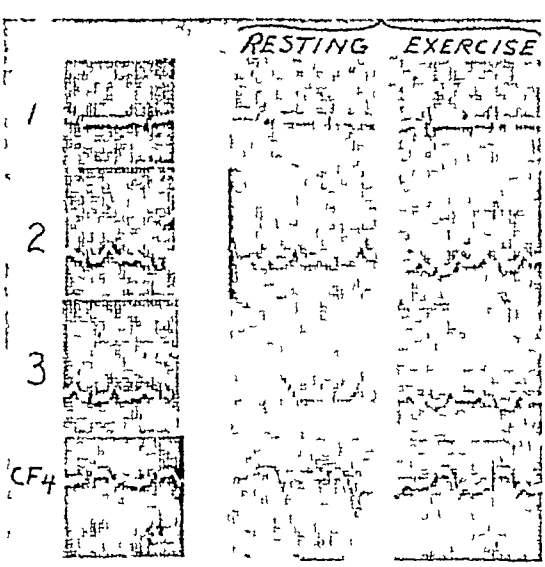


FIG 7 Effect of exercise following infarction First tracing taken on second day of acute anterior infarct. Second tracing, during convalescent stage, shows typical serial T_1 and T_4 changes Following exercise the tracing reverts to its appearance during the acute stage of infarction

Metabolic Influences on the Electrocardiogram

From this consideration of the pathogenesis of the electrocardiographic patterns of hypertrophy one sees that changes in the QRS represent structural alterations and are stable, whereas the ST segment and T wave changes are due to metabolic factors and are more variable This is a good working rule The ST segment and T wave are influenced not only by ischemia but by almost endless other metabolic factors as well, serum electrolytes (particularly potassium), acid-base balance, hormones and hormone deficiencies, toxins, and drugs, to mention only a few Consequently, one must exercise some caution in interpreting T wave changes A practical illustration of this is seen in electrocardiograms taken postoperatively where striking temporary T wave inversions develop normally during the first week or so following any type of major surgery, probably due to changes in serum potassium and acid-base balance [20] One must be very reserved therefore, in making a diagnosis of coronary occlusion or cardiac injury on the basis of such electrocardiographic changes postoperatively

One of the most important agents producing ST and T wave abnormalities is digitalis It becomes extremely difficult to make a diagnosis of myocardial ischemia or myocardial involvement if digitalis has been given, and where an electrocardiogram is to be made, it should, if possible, be taken prior to digitalization or three weeks after digitalis is discontinued, or the fact should at least be indicated that digitalis is being administered so that proper diagnosis is not confused

Apart from the effect on the ST and T, one can frequently recognize digitalis effect by the abbreviation of the ventricular complex, i e, a shortening of the QT interval The duration of the QT, which varies with the heart rate,* is an important sign to which insufficient attention has been paid It is lengthened by cardiac poisons such as quinidine and in heart disease, and it has recently been reported that this sign is of value in rheumatic carditis [21] Conversely, the QT is shortened by digitalis and calcium, both of which enhance the mechanical efficiency of the heart This effect may provide some clue to the mechanism of action of digitalis Evidence has been

* Nomograms have recently been prepared which permit direct reading of the Q-T interval corrected for heart rate [Kissin M Schwarzschild M M and Bakst H Am. Heart J 35 990 (1948) Goldberger, E *ibid* 36 141 (1948)]

The ratio $\frac{\text{duration of mechanical systole}}{\text{duration of electrical systole (QT)}}$ would appear to be a better expression of the functional integrity of the heart than the QT interval alone

presented that repolarization arrests the contractile process and that the electrical processes control the mechanical rather than the electrical [22] Inasmuch as in the failing heart there is no deficit of high energy phosphate for oxidative purposes, the action of digitalis may be related to accelerating repolarization at the muscle membrane surface as reflected in an abbreviated ST and T, rather than affecting the energy metabolism of the myocardium directly [23] In heart failure due to cardiac ischemia (and probably in myocarditis) where high energy phosphate and oxidative enzymes are affected unlike mechanical heart failure, digitalis has, as is known clinically, little beneficial effect

Coronary Insufficiency

No discussion of the electrocardiogram would be adequate without emphasizing that severe myocardial disease may exist with a perfectly normal electrocardiogram More than half of subjects with organic angina pectoris exhibit a normal electrocardiogram at rest While the coronary circulation may be adequate at rest in subjects with coronary disease, it is inadequate when the work of the heart is increased, and under these circumstances transitory electrocardiographic changes in the form of depressions of the ST segment and T wave changes very often appear which establish a diagnosis of coronary insufficiency [24] In subjects complaining of chest pain where the resting electrocardiogram is normal, examination is incomplete unless an attempt is made to induce coronary insufficiency Various forms of stress have been employed such as inhalation of low concentrations of oxygen, epinephrine and pitressin injections, and exercise. The simplest, safest, and most physiologic of these procedures is exercise A quantitative two-step test has been recommended by Master but if the steps are not available, it suffices quite well to have the patient mount a kitchen stool 20 to 30 times in one and a half to two minutes, depending on his agility and tolerance to effort.[24] Factors other than the quantitative amount of work done are important, as we know clinically from circumstances causing angina pectoris Thus, if the patient is exercised after a heavy meal or in a cold room or if he is apprehensive, the number of positive responses is greatly increased If pain develops during the performance, naturally the exercise should be stopped promptly Electrocardiographic changes usually develop before any pain occurs Tracings should be taken at brief intervals following exercise Usually such changes as develop are transitory and disappear within ten minutes It should be emphasized that changes may not be maximal or may not even be evident in the first minute after exercise but are often greatest three to five minutes after completing exercise Some caution is necessary in interpreting the result, which can be gained only by experience If there is any considerable tachycardia, it becomes very difficult to evaluate the ST segment since the isoelectric line from the end of one beat to the beginning of the next disappears Hyperventilation may produce changes indistinguishable from coronary insufficiency [25] Properly performed and interpreted the test is of great value The newer direct writing instruments are of great advantage since one can see the tracing as it is recorded

We have found application of the coronary insufficiency test quite valuable in assessing the extent of recovery and fitness to resume work in patients convalescing from coronary artery occlusion. Instead of arbitrary advice one can, with this test, evaluate whether any considerable ischemia still exists in and around the infarcted area Naturally the amount of exercise in such cases should be limited and only carried out after the acute attack has subsided and the patient is up and about Usually, we have the patient mount a stool holding him by the hand fifteen times in one and a half minutes. If recovery has been complete no changes appear but if ischemia still exists the tracing after exercise may revert back to its appearance during the initial stages of the attack (Fig 7) Under such circumstances we know that the patient requires further rest before he can undertake any extensive physical activity

Summary

Electrocardiography remains an empiric science but appreciation of fundamental factors which determine the ventricular complex is helpful in interpreting the variations which occur in health and in disease

It is shown that the ventricular complex represents almost entirely the electrical activity of the free wall of the left ventricle and that the right ventricle and the interventricular septum normally contribute but negligibly to the electrocardiogram. The derivation of the standard limb leads and the effect of positional variations of the heart are described as well as certain major abnormalities such as infarction and coronary insufficiency, hypertrophy, bundle branch block, and metabolic influences on the electrocardiogram. The relation of the standard limb leads to the unipolar limb leads is discussed, and it is emphasized that unipolar leads offer little advantage over the standard leads except in differentiating the normal from the pathologic Q_3 deflection. The conventional CF precordial leads likewise suffice for routine clinical purposes and are somewhat more apt to exhibit abnormali-

ties than the CR or V leads However, since CF leads occasionally exhibit spurious abnormalities particularly in children and slender subjects, V leads may be preferable Under special circumstances further leads may be helpful, such as the CR_2 lead (which records the auricular potential particularly well) in analysis of arrhythmias and a back chest lead in certain cases of posterior infarction Serial precordial leads are valuable in mapping out the extent of infarction It is emphasized that the electrocardiogram has prognostic was well as diagnostic value in acute coronary occlusion

References

1 Wilson F N Proc A Life Insur M Dir Amer 24 96 (1937)
2 Wilson F N Johnston F D Rosenbaum, F F, Erlanger H Kossman C E Hecht H, Cotrim N De Oliveira R. M, Scarsi R. and Barker, P S Am Heart J 27 19 (1944)
3 Wilson F N Rosenbaum F F, and Johnston F D Advances Int Med 2 1 (1947)
4 Hecht H H Am Heart J 32 30 (1946)
5 Battro A and Bidoggia H *ibid* 33 604 (1947)
6 Sodi Pallares D *et al* *ibid* 33 819 (1947)
7 Wilson F N, Johnston F D, McLeod, A G, and Barker, P S *ibid* 10 447 (1934)
8 Goldberger E Unipolar Lead Electrocardiography, Philadelphia, Lea & Febiger 1947
9 Ungerleider, H E and Gubner, R Am Heart J 33 807 (1947)
10 Nyboer, J *ibid* 22 469 (1941)
11 Gubner R and Thomashow, A I Am J Med 3 126 (1947)
12 Lyle A M Am Heart J 28 199 (1944)
13 Myers G B, and Oren B G *ibid* 29 708 (1945)
14 Goldberger E *ibid* 30 341 (1945)
15 Ungerleider, H E and Gubner R *ibid* 33 807 (1947)
16 Ziegler R F *ibid* 35 769 (1948)
17 McGinn S and White P D J A.M A 104 1473 (1935)
18 Horn H, Dack S and Friedberg, S Arch Int Med 64 296 (1939)
19 Gubner R and Ungerleider H E *ibid* 72 196 (1943)
20 Gubner R J A M A 124 122 (1944)
21 Taran L M and Szilagyi N Am Heart J 33 14 (1947)
22 Blair H A Wedd A M and Young A C Am. J Physiol 132 157 (1941)
23 Wollenberger A *ibid* 150 733 (1947)
24 Master, A M Gubner R, Dack S and Jaffe, H L Arch Int Med 67 647 (1941)
25 Master A M Nuzie S Brown R C, and Parker R C Jr Am J M Sc 207 435 (1944)
26 Ungerleider H E Duhigg T F and Gubner R U S Nav M Bull 41 441 (1943)

PRIZE ESSAYS

The Merrit H Cash Prize and the Lucien Howe Prize will be open for competition at the next Annual Meeting of the Medical Society of the State of New York, May 2, 1949, in Buffalo

The Lucien Howe Prize of $100 will be presented for the best original contribution on some branch of surgery, preferably ophthalmology The author need not be a member of the Medical Society of the State of New York

The Merrit H Cash Prize of $100 will be given to the author of the best original essay on some medical or surgical subject Competition is limited to the members of the Medical Society of the State of New York, who at the time of the competition are residents of New York State

The following conditions must be observed

Essays shall be typewritten or printed with the name of the prize for which the essay is submitted, and the only means of identification of the author shall be a motto or other device The essay shall be accompanied by a sealed envelope having on the outside the same motto or device, and containing the name and address of the writer

If the Committee considers that no essay or contribution is worthy of a prize, it will not be awarded

Any essay that may win a prize automatically becomes the property of the Medical Society of the State of New York "to be published as it may direct"

All essays must be presented not later than February 1, 1949, and sent to the Chairman of the Committee on Prize Essays of the Medical Society of the State of New York, 292 Madison Avenue, New York 17, New York.

ARMITAGE WHITMAN, M D, *Chairman*
Committee on Prize Essays

A GUIDE TO THE USE OF PROCAINE PENICILLIN IN HOSPITAL PRACTICE

GENE H STOLLERMAN, M D , EDWARD H ROSTON M D , and BEATRICE TOHARSKY, M A , New York City

(From the Medical Services and the Division of Bacteriology of Mount Sinai Hospital)

UNTIL recent months crystalline penicillin G was employed routinely in hospitals for the control or prevention of certain bacterial infections, usually by intermittent intramuscular injections every three hours Penicillin administered orally, while of some value in home therapy and particularly in pediatrics, is still too irregular in its absorption from the gastrointestinal tract for the treatment of the usual hospital case Moreover it requires about five times the parenteral dose and is consequently more expensive and wasteful. Penicillin-in-oil-and-beeswax (Romansky formula) produces consistent therapeutic blood levels for at least twelve hours when 300,000 units are given by intramuscular injection.[1] With this preparation, the need for repeated injections is reduced in frequency from three-hour to twelve- or twenty four hour intervals This preparation, however, has proved to be less efficient and less convenient in our hands than the newer repository penicillin products, because of more frequent irregularities in absorption from the intramuscular depot and occasional violent reactions due to allergy to the beeswax [2–5]

The obvious advantages of single daily injections of penicillin for routine hospital therapy can be secured by the intramuscular administration of procaine penicillin Carefully controlled experience on hundreds of patients has shown this product to be so reliable in the constancy and duration of effective therapeutic blood levels that we now employ it almost exclusively as a substitute for crystalline penicillin G It is relatively simple to administer and well tolerated by patients It is no more expensive to use than crystalline penicillin, and as one daily injection is required as a rule, there is a large saving in precious nursing labor and in equipment

Procaine Penicillin Products

Procaine penicillin is a sparingly soluble salt which is prepared by the chemical combination of procaine and penicillin G It is available commercially suspended either in water or various vegetable oils Usually 1 cc. contains 300 000 units of penicillin in chemical combination with approximately 125 mg of procaine base Its actual penicillin potency is 940 units per mg In most of the commercially available preparations at least 50 per cent of the particles in the water or oil suspension have a length of 50 or more microns By virtue of its particle size and sparing solubility, procaine penicillin is slowly absorbed by the tissues and thereby produces a prolonged blood level for twenty four hours or more

Even more prolonged blood levels (up to ninety-six hours or longer) can be obtained by the injection of procaine penicillin in oil gelled with aluminum monostearate to delay absorption further Presumably, this exerts its effect by coating the individual procaine penicillin particles and thereby making them water-repellent While it has been assumed that the large size of the procaine penicillin particles in other procaine penicillin preparations plays an important role in delaying absorption from the usual water or oil menstrua, investigators have reported recently that a small particle size of procaine penicillin is preferable when used with aluminum monostearate, because more of the antibiotic is coated and absorption is therefore, delayed even more effectively [6] Most of the procaine penicillin particles in the aluminum monostearate preparations are under 2 microns and practically all are under 5 microns in length Procaine penicillin with aluminum monostearate is available only in oil

Since the introduction of these improved products, we have used most of the procaine penicillin preparations available commercially in several thousand individual injections, both in water and in oil suspensions. In addition, we have used a variety of oil menstrua (sesame oil hydrogenated peanut oil, hydrogenated peanut oil with pectin) Very little individual difference has been noted among the various products as to blood levels over a twenty four hour period, following a single intramuscular injection All have been found to be extremely well tolerated as to local reaction, pain and systemic reaction. In our extensive experience we have not yet encountered any instance of procaine sensitivity although we have been informed of two cases of dermatitis after two weeks of therapy on daily doses of 600 000 units [6]

The oil suspensions are exceedingly stable and may be stored without refrigeration for an indefinite period It is most important that the syringe and needles used for their administration be completely dry and, after usage, thoroughly cleansed with detergents or fat solvents. In giving an intramuscular injection, it is also important to avoid accidental intravenous administration in

order to avert an oil embolus, as with any other oil preparation [7] For this reason injections of procaine penicillin in oil are administered in our institution only by physicians Since the patients usually require only one injection per day, this is not an arduous task

Aqueous suspensions are made up by adding distilled water or isotonic saline to the stable dry salt This suspension may be kept at room temperature for one week without deterioration Intravenous injection should be carefully avoided However, we have given up to 1 cc intravenously to dogs without any untoward reactions In sacrificed animals, microscopic sections of the organs revealed that some of the larger particles of procaine penicillin had lodged in lung capillaries, but they had not given rise to any local inflammatory reaction and had not interfered with the pulmonary circulation As a result of these experiments and several months of clinical trial on several hundred patients, we feel that the possibility of accidental embolization with the aqueous suspension is minimal and that the hazard, if it should occur, is negligible Nurses are, therefore, permitted to administer these preparations in our hospital

It is important to emphasize that all preparations of procaine penicillin, oil and aqueous, and particularly the latter, must be vigorously shaken for thorough dispersion immediately before being drawn up into the syringe, and then promptly administered before settling of particles can take place in the syringe and needle If this is done, the aqueous suspension can be administered as easily as the oil preparations, and the annoying tendency for the particles to adhere to one another and to the wall of the syringe and needle can be avoided Needles of 20 gauge or larger are recommended

Blood Levels Obtained with Intramuscular Procaine Penicillin

We have determined penicillin serum concentrations after intramuscular injections of procaine penicillin in over 200 hospital cases The method of penicillin assay employed was a "broth dilution method" using Staphylococcus aureus H as the test organism and beef infusion broth as the medium, as described in detail by King, Schneierson, *et al* [8] Tables 1 and 2 summarize the most pertinent portion of our data

TABLE 1 —PENICILLIN BLOOD LEVELS FOLLOWING A SINGLE INTRAMUSCULAR INJECTION OF PROCAINE PENICILLIN IN AQUEOUS OR OIL MENSTRUA

Dose	Hours	Number of Patients	Average Penicillin Level in Oxford Units per cc of Serum	Percentage of Patients with Level of 0 05 Unit or Higher
300 000 units	1	9	1 46	100 0
	2	9	1 62	100 0
	3	9	1 44	100 0
	4	9	1 35	100 0
	8	9	0 85	100 0
	12	130	0 60	98 6
	24	128	0 20	81 8
	36	59	0 12	76 7
	48	11	0 05	62 7
600 000 units	2	5	1 97	100 0
	12	7	0 99	100 0
	24	5	0 35	100 0

TABLE 2 —PENICILLIN BLOOD LEVELS FOLLOWING A SINGLE INTRAMUSCULAR INJECTION OF PROCAINE PENICILLIN (SMALL PARTICLE) IN OIL WITH 2 PER CENT ALUMINUM MONOSTEARATE

Dose	Hours	Number of Patients	Average Penicillin Level in Oxford Units per cc of Serum	Percentage of Patients with Level of 0 05 Unit or Higher
300 000 units	1	6	0 25	100 0
	24	6	0 21	100 0
	48	6	0 17	100 0
	72	6	0 07	100 0
	96	6	0 06	83 3
	120	6	0 04	66 7
600 000 units	1	6	0 35	100 0
	24	6	0 16	100 0
	48	6	0 19	100 0
	72	6	0 15	100 0
	96	6	0 07	83 3
	120	5	0 08	80 0

These results were obtained with a variety of commercial procaine penicillin products and are tabulated together, since little significant difference in blood levels could be detected when products from the various pharmaceutical firms were employed * These figures demonstrate that a single dose of 300,000 units given intramuscularly will sustain a good therapeutic blood level of penicillin (above 0 05 unit) in virtually all individuals for twelve hours and in over 80 per cent for twenty-four hours Doses of 150,000 and 200,000 units of procaine penicillin frequently provide adequate blood levels for twelve and even twenty-four hours However, more frequent exceptions are encountered than when 300,000 units are used to produce the daily depot, and, therefore, lower doses are not recommended for adults

The blood levels obtained after the intramuscular administration of 600,000-unit doses are in accord with the observations of other authors [9] They demonstrate that by this dosage the percentage of effective therapeutic blood levels at twenty-four hours (above 0 05 unit per cc) can be raised to practically 100 per cent We have observed that the blood levels do not necessarily increase arithmetically with the dosages, as one can expect with crystalline penicillin G [10]

* For these studies procaine penicillin preparations were generously provided by Schenley Laboratories (procaine penicillin in oil and procaine penicillin in oil with aluminum monostearate), E R. Squibb and Sons (procaine penicillin aqueous Crysticillin), and by Eli Lilly and Co (procaine penicillin in oil Duracillin) In addition a series of observations were made with preparations from several other manufacturers

For instance, 150,000 units provide twelve-hour levels considerably higher than the predicted one half of the corresponding 300,000-unit level The 300,000-unit level is in turn about two thirds rather than one half that of the 600,000-unit blood level It would seem that absorption is delayed with an increasing dose in a single depot. However, blood levels as high as 5 units in six hours and 4 units in twenty-four hours have been reached with 3 000,000 units (10 cc given as one 5-cc dose in each buttock) Following this dose, penicillin was no longer detectable in the blood on the third day (This is in contrast to the results obtained with much lower doses of preparations containing aluminum monostearate as is discussed below) Much beyond this dose, therapy becomes less practical, necessitating multiple injections or a volume of fluid large enough to cause the patient considerable discomfort when injected intramuscularly In addition, we do not have sufficient data as yet relative to the possible adverse effects of a high accumulation of procaine in the serum, and until this is available it is inadvisable to go any higher in dosage.

Maximum blood levels with procaine penicillin in aqueous and oil menstrua are reached within one to two hours However, this peak is much lower than is observed in ten or fifteen minutes after a corresponding dose of crystalline penicillin G, and it falls off at a much slower rate One hour after an intramuscular injection of 300,000 units of crystalline penicillin G, the blood level has usually dropped to the level observed, as a rule, twelve hours after the same dose of procaine penicillin

The procaine penicillin preparations which contain aluminum monostearate are absorbed still more slowly and uniformly Consequently the peak levels are even lower but the maintenance of an effective therapeutic blood level is considerably longer (Fig 1) After an intramuscular dose of 300 000 units of procaine penicillin (small particle) in peanut oil with 2 per cent (weight/volume) aluminum monostearate, the average blood level after the first hour is 0.25 unit compared with 1 46 units produced by procaine penicillin suspended in either oil or aqueous menstrua The level does not drop below 0 05 unit for at least ninety-six hours in the vast majority of cases and therapeutic levels of this range are frequently maintained for as long as one hundred twenty hours Larger doses of this preparation do not produce commensurately greater peak levels but provide a relatively constant prolonged level at a higher plateau over the course of at least four or five days Thus, 600 000 units of procaine penicillin with aluminum monostearate produce a blood level of 0.35 unit one hour after intramuscular injection, and a therapeutic level is maintained for five days in four out of five patients studied In one patient given an injection of 3,000,000 units (ten times the usual therapeutic dose), the blood level at one hour was raised only to 1 3 units (five times the expected level from an injection of 300 000 units of the same preparation) Seven days after this injection the patient still had a blood level of 0 1 unit This same patient had previously been studied after an injection of 3,000 000 units of procaine penicillin in aqueous suspension (see above) and was found to have much higher peak levels (5 units in one hour) but no detectable penicillin blood level in seventy two hours It is, therefore apparent that very high blood levels are not easily achieved by the employment of procaine penicillin with aluminum monostearate but that the levels attained can be greatly prolonged

It is of interest that blood levels do not seem to reflect a cumulative effect when the intramuscular administration of procaine penicillin in aqueous or oil suspension is repeated daily or twice a day In five patients receiving between 300 000 and 600,000 units every twelve hours, in whom blood levels were determined at twelve hours and then every twenty four hours for as long as twenty four days a progressive rise beyond the initial twelve-hour level was not observed However peak levels occurred one to two hours after each injection, so that the average level through an entire twenty four-hour period was higher when the injection was repeated every twelve hours than when the dose was given once a day The failure to achieve a cumulative increase in the twenty four hour determination during successive days after daily intramuscular injections can also be observed in the data of other authors who have given daily injections of procaine penicillin with aluminum monostearate, in spite of the fact that therapeutically effective blood levels persist

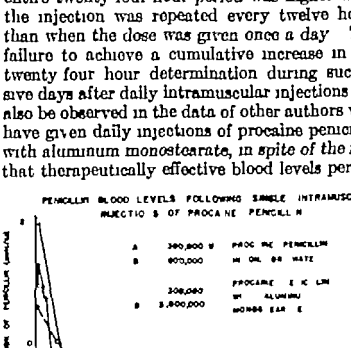


FIG 1

ninety-six hours or more after a single dose This phenomenon deserves further study for verification

While our data on pediatric dosage is still limited, we have found in 21 infants, weighing from 5 to 25 pounds, that an intramuscular injection of 150,000 units of procaine penicillin in aqueous or oil suspension without aluminum monostearate provides a therapeutically adequate blood level at twelve hours and in 14 out of 15 patients at twenty-four hours This dosage seems to be well tolerated by infants

Recommendations for Penicillin Therapy in Hospital Practice

1 Dosage of Procaine Penicillin —A daily intramuscular injection of 300,000 units of procaine penicillin in aqueous or oil suspension is therapeutically adequate in most common infections caused by organisms which are penicillin-sensitive For organisms which are only moderately sensitive to penicillin (coefficient of resistance five or more times that of the standard Staphylococcus aureus H), the dose should be 600,000 units once or twice a day Table 3 lists these organisms and their usual in vitro sensitivity

TABLE 3 —RANGE OF IN VITRO SENSITIVITY OF BACTERIA TO PENICILLIN

Bacteria	*Penicillin Units* per cc of Serum
Staphylococcus aureus	0 02 –4 0
Streptococcus hemolyticus Group A	0 01 –0 1
Green streptococci (viridans)	0 02 –0 4
Enterococci Group D (Str fecalis)	0 1 –7 4
Neisseria meningitidis	0 02 –0 04
Neisseria gonorrhea	0 01 –0 02
Diplococcus pneumoniae	0 005–0 05

When using procaine penicillin in oil with aluminum monostearate, the doses may be spaced several days apart Studies on the clinical response to various doses of procaine penicillin with aluminum monostearate administered at varying intervals are now in progress From our experience to date it would appear that this preparation will be extremely useful for the treatment of infections due to bacteria with a resistance of 0 1 unit or less, since injections of doses up to 3,000,000 units can achieve this level and maintain it for practically one week For the present, however, it is best to employ a daily dose schedule rather than to depend upon a single intramuscular injection of procaine penicillin with or without aluminum monostearate

2 Identification of Bacterium and Determination of Its Resistance to Penicillin —Because of the consistent predictability of adequate therapeutic blood levels at twenty-four hours after the intramuscular injection of the recommended doses of procaine penicillin, blood level determinations are no longer necessary as a guide to treatment However, it is as important as ever to identify the bacterium in every instance of infection and to determine its relative resistance to penicillin (or streptomycin), so that an adequate daily dose of procaine penicillin may be given

3 Administration —Procaine penicillin in a water suspension may be administered by nurses, but they should be instructed to shake the mixture thoroughly and then to administer it promptly so as to avoid clogging of the needle Procaine penicillin in oil, as with any other oil preparation is best administered by a physician because of the remote danger of oil embolism To economize on labor, it is desirable to make all injections of procaine penicillin on a ward at one time of the day

4 Therapeutic Response —The therapeutic response to penicillin in vivo does not always parallel the in vitro sensitivity of the organism [11] Also, successful treatment is not always dependent on the maintenance of a constant blood level at a range which is usually curative for most organisms of the same relative sensitivity It is, therefore, also necessary to evaluate the dosage in each patient on the basis of clinical response

5 Single Dose Therapy —Twenty-three cases of bacterial pneumonia have been treated by Boger and his associates with a single intramuscular dose of procaine penicillin in oil [4] Eleven cases received 300,000 units, and 12 cases received 600,000 units in one injection While a surprisingly high number of excellent clinical responses occurred, there were several relapses in each series

6 Syphilis and Gonorrhea —The treatment schedule with procaine penicillin in certain infections, such as syphilis, has not yet been determined definitely In primary and early secondary syphilis, 300,000 units of procaine penicillin in water or oil suspension daily for ten days or 300,000 units of procaine penicillin with aluminum monostearate every other day for the same period would seem to be adequate for most cases For late secondary and tertiary syphilis and for cerebrospinal lues, more prolonged or repeated schedules of therapy may be required A single injection of 300,000 units of procaine penicillin with or without aluminum monostearate should be adequate for the cure of gonorrhea

7 Subacute Bacterial Endocarditis —Subacute bacterial endocarditis, when due to susceptible organisms of average penicillin resistance (one to three times the resistance of the standard strain of Staphylococcus aureus H), can be treated with 600,000 units of procaine penicillin given once daily for six to eight weeks For endocardial infections due to bacteria with a penicillin resistance five or more times that of the standard strain of Staphylococcus aureus H, this dose should be re-

peated twice a day for six to eight weeks It is important to emphasize that the duration of treatment cannot be shortened by increasing the dosage King *et al.* have given massive doses of crystalline penicillin G, 14,000 000 units a day (1,000 000 units intravenously every hour for ten hours and 1,000 000 units intramuscularly four times a day), and have administered 4 Gm. of caronamide every four hours during this period to retard renal excretion of penicillin. In spite of blood levels of 5 to 460 units during this period, we failed to cure seven out of eight cases of subacute bacterial endocarditis due to penicillin sensitive strains of Streptococcus viridans Four of the seven cases that relapsed on this regimen of massive therapy were subsequently cured by a second course of treatment over a longer period of time (six to eight weeks) with much smaller doses (100,000 units of crystalline penicillin G every three hours or 450 000 to 600,000 units of procaine penicillin twice a day) Of the three remaining cases, two are still under treatment, and one died of cardiac failure with active endocardial infection still present [12]

Procaine penicillin with aluminum monostearate will undoubtedly find use in the therapy of this disease as blood levels are prolonged for several days, within the therapeutic range for the usual strain of Streptococcus viridans, following a single intramuscular injection However, it should be emphasized that this preparation may have limitations in that blood levels, although more prolonged, do not show the peaks observed following injections with crystalline penicillin G and to a lesser extent following injections with procaine penicillin in water or oil menstrua It has been emphasized that these "peaks," especially as obtained with "booster" doses of penicillin, may assume importance when dealing with deep-seated foci of infection [13]

8 Prophylaxis.—For the prevention of infection at the time of surgical operations, tonsillectomies, and dental extractions an injection of 300,000 units of procaine penicillin once a day for one or more days is adequate.

9 Crystalline Penicillin Versus Procaine Penicillin.—There are now relatively few indications for the use of crystalline penicillin G In rare cases where sensitivity may develop to procaine, the usual intermittent intramuscular injections of crystalline penicillin every three hours around the clock are indicated In infections due to highly resistant organisms, with a coefficient greater than 20 times the resistance of the standard organism, it is probably safer to use crystalline penicillin by intramuscular or intravenous doses to maintain the desired blood level and to secure extraordinary high peaks of blood level repeatedly during the day At least until further experience is available concerning the possible toxic effects of procaine liberated from large doses of procaine penicillin, this should be the method of choice The desired intramuscular dose of crystalline penicillin may be determined by reference to the tables for serum concentrations following various doses which have been published [10 13] In overwhelming infections an initial "booster" dose may be given intramuscularly or intravenously at the time procaine penicillin treatment is started so that a high blood level may be achieved immediately Such "booster" doses of crystalline penicillin may be repeated advantageously twice a day if the organisms are relatively resistant or if penetration into dense foci of infection is required

There is evidence that procaine may inhibit the action of sulfonamides in infections.[14] Studies are in progress to determine whether sufficient procaine is liberated from procaine penicillin to produce this effect Until this is definitely known, crystalline penicillin is to be preferred in infections in which simultaneous treatment with sulfonamides is indicated

Crystalline penicillin is, of course, required for the preparation of solutions for topical application, intrathecal intrapleural, intra-abdominal, intra-articular, intratracheal, and antral instillations in the preparation of aerosols and in oral preparations

References

1 Romansky M J and Rittman E L New England J Med. 233: 577 (1945)

2 Sullivan, N P Symmes A T Miller H C., and Rhodeshamel H W ,Jr Science 107: 169 (Feb. 13) 1948.

3 Herrell W E. Nichols, O P., and Heilman, F R. Proc Staff Meet. Mayo Clin 22 567 (Dec 10) 1947

4 Boger W P Gritt, J E. Israel, H L. and Flippin H F Am J M Sc. 215: 50 (Mar) 1948.

5 Thomas, E W Lyons R H Romansky, M J Rein, C R. and Kitchen, D K. J A.M.A 137 1617 (Aug 21) 1948.

6 Landau David Personal communication to the authors

Bondy P K and Sheldon W H Proc Am. Federation Clin. Research 3 0 (1947)

8. King, F H Schneierson, S S., Sussman, M L., Janowitz H D., and Blum L. Proc Soc Exper Biol & Med 66: 548 (1947)

9 Hewitt, W L. Whittlesey P., and Keefer C S New England J Med. 239: 85 (Aug. 19) 1948.

10 Tucker H A., and Eagle H. Am. J Med. 4: 343 (1948)

11 MacLeod, C. M , and Stone E R Bull. New York Acad Med 21: 375 (1945)

12 King, F H Schneierson S. S Sussman M L.,Janowitz, H. D and Stollerman G H : J Mt Sinai Hosp. To be published.

13 Gerber, I. E. Shwartzman, G., and Bashr G : J.A.M A., 130: 761 (Mar 23) 1946

14 Peterson O L., and Finland, M Am. J M Sc 207 166 (Feb.) 1944.

The number of people over forty developing tuberculosis having had a recent normal chest film, indicates that no age is immune from tuberculosis.—*Exchange*

ELUSIVE MENTAL CASES

The Epileptic Personality

B LIBER, M D , F A P A , New York City

(From the Mental Hygiene Clinic, New York Polyclinic Hospital)

SOMETIMES it is difficult to know which condition is the cause and which the effect of an illness

Epilepsy is supposed to be characterized not only by the well-known specific seizures but also by a peculiar epileptic mentality, consisting of a tendency to seclusiveness, irritability, excessive sensitivity, to being temperamental, and to a great difficulty for the patient to adjust himself socially This mental state is called the epileptic disposition or the epileptic personality However, from the psychiatric point of view it is often impossible to determine whether the character of these patients is an inherent and inseparable part of their disease, one of its symptoms, a concomitant mental state without which this illness would not exist, or a consequence of the convulsive attacks and the maladjustment created by them In the trivial cases, we are rather inclined to the latter conclusion

Two unrelated young men of approximately the same age, about twenty-four, seemed to be normal The groups in which they mingled regarded them as "healthy guys" who happened to be "funny" ("There is nothing the matter with them, except they are queer") Nor did the average physician find anything out of the ordinary in them unless he was told of their fits They were accepted for the military service and served a short time, both being incapacitated by small but temporarily disabling wounds There was no war neurosis

At about the age of ten or twelve they began to suffer from minor lapses of consciousness of short duration and at irregular intervals The patients were aware of the attacks only after observers reported them If spasms or convulsions occurred, they were not noticed by any members of the respective families

From time to time other forms of the disorder, epileptoid absences or epileptic equivalents, seemed to thrust themselves into the memory or consciousness of these patients or were mentally reconstructed, more by logical reasoning than by actual knowledge Some authors call such states oneiric or oneiroid—brief waking dreams, as it were Others regard them as crepuscular or twilight conditions, but to this observer they appear to be completely empty and to contain none of the dream elements and no mental experiences The impression is that of a total blankness, a momentary but real abstraction and withdrawal of the mind from any fact, person, or object, or perhaps even the nonexistence of mind

For instance, during a conversation, there would be a short interruption and then a correct continuation of the speech Perhaps only one or two words were omitted, but they were not missed by the interlocutor, who probably understood the whole sentence and was hardly aware of the phenomenon Nor did any change of the body position take place On the contrary, in the critical moment the patient was motionless, and his eyes showed a glassy gaze or stared fixedly into space until familiar gesticulations and sounds returned

Many of the more outstanding attacks of unconsciousness were of the nocturnal type They were often observed by the parents because the patients would awaken worn and haggard, with no understanding of where they were One of the men, in addition to the many petit mal fits, had twice had typical grand mal seizures, confirmed by a good description made by an intelligent and reliable informant

These patients with an externally normal appearance were not always slow or mentally deteriorated, as they are sometimes described by other observers Up to the age of sixteen or seventeen they were bright and wide awake, interested in their surroundings, and full of hope for their own futures About that time a change gradually developed, but it was not a lowering of their intelligence On the contrary, the keener they became, the more they were convinced that they were fighting a losing battle

Fighting? For a long time, they were unaware of any hostility anywhere They had both been excellent students in high school, although they had instinctively avoided the sports and the games A mental depression appeared, and both boys tried to drown it or cover it up with new activities, each in a different manner They vaguely felt some social obstacles in their way X began to drink and to make merry with other young men—never with women Y plunged into reading—usually abstruse philosophic and mathematical works The latter grew indifferent to sex and uninterested in any gainful occupation Secretly, the former burned with a passion for

girls, and, contrary to the impression one may have had from the circle with which he associated in his spare time, he was averse to homosexualism. In fact, he was a woman's man, but he was afraid of the female sex Being conscious of his condition, he was timid

And now, something else happened He who had masturbated from time to time in a fully conscious state began to do so several times a day and furiously Moreover, intimate witnesses assured us that of late he regularly abused himself while under his epileptic fit and as the spell was usually extremely short, his sexual misuse of himself was mostly abortive This might have suggested another diagnosis in his case perhaps his attacks were of a hysteric instead of an epileptic nature but in view of his past history and of the findings of an electroencephalographic examination, his malady had to be classified in the previously accepted category

He was a jeweler but refused to work at his trade in a shop where, he believed, others might watch him and perhaps discover his attacks, which, by the way, had never been seen by anybody outside his family He was satisfied with an easy laboring job, performed at night, when, as he said, there were but few people around

As to Y, his complex forced him into a bolder quasiparanoic state He suspected people of suspecting his trouble He was sure to fail at anything that he might undertake He could have functioned as a fine draftsman as he had done before he lost confidence in himself As long as his parents were willing to feed him, he preferred not to leave the house.

Several physicians had tried their hands in both these cases. The ketogenic diet, low carbohydrate and high fat intake, bromides phenobarbital, and dilantin sodium had not been successful Tridione seems to have some favorable effect on the elusive spells, but it is too early to be certain At any rate, it is no more a real cure than any of the drugs that have been used in the various epileptic forms for centuries

In a third and similar case, the patient was saturated and mentally confused through over doses of the usual medication The removal of all the drugs had the effect of bringing back the petit mal attacks more frequently, but the mind cleared up beautifully, while the thinking process improved greatly

A fourth man was mistakenly placed at Craig Colony, a New York State hospital for the more advanced and somewhat degenerated mental cases He became discouraged and unhappy in that environment and broke down mentally His symptoms, those of a manic depressive psychosis, depressed type disappeared after his release from the institution There was no sign of this condition before his admission, and after his return home, he was soon rehabilitated and resumed a useful life

The fact to be emphasized in these extremely light cases and in many others seen by this writer is that none of them presented a real and demonstrable "epileptic personality" Whenever a complicating mental disturbance occurred, it was rather of the irregular behavior type and was induced by the circumstances of the ailment and by the patients' awareness of it The mental problem was always secondary to the seizures and to the feeling of inferiority created by them. The mechanism resembled other frustrations of a more or less serious nature Psychotherapy was invariably helpful as far as the mental disorder was concerned

65 WEST 95TH STREET

SURGEONS PRAISE BONE BANK

The fact that bone may be preserved in a frozen state for weeks and is of definite value in bone-grafting operations has been acclaimed by Leonard F Bush M.D., of Danville, Pennsylvania, and C Zent Garber, M D of New York, in a recent issue of the *Journal of the American Medical Association*

The doctors first experimented successfully on large chinchilla rabbits, using bone which had been kept in a deep freeze cabinet at minus 20 to 30 C for as long as 84 days. With no complications in these operations, they attempted using it in human patients.

For comparative purposes they used outside bone in operations on 104 patients under three different methods. Twenty four of these operations were by direct transfer from the donor to the patient in 37 cases, the bone was kept under refrigeration at plus 2 to plus 5 C and in 43 of the operations, the bone had been stored in a deep freezer There were only four complications in all 104 cases.

The surgeons pointed out that the possibility of having a large supply of frozen bone available might be an important aid in many operations It was pointed out that, while a bone bank on a small scale is desirable in every hospital which has an active bone and joint service there are great possibilities for further development of large bone banks to supply the needs of surgeons in each community for bone transplants of every size and description So bone banks may soon be joining eye banks in the reserves which medical science is setting up to protect the health of all

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From time to time other forms of the disorder, epileptoid absences or epileptic equivalents, seemed to thrust themselves into the memory or consciousness of these patients or were mentally reconstructed, more by logical reasoning than by actual knowledge Some authors call such states oneiric or oneiroid—brief waking dreams, as it were Others regard them as crepuscular or twilight conditions, but to this observer they appear to be completely empty and to contain none of the dream elements and no mental experiences The impression is that of a total blankness, a momentary but real abstraction and withdrawal of the mind from any fact, person, or object, or perhaps even the nonexistence of mind

For instance, during a conversation, there would be a short interruption and then a correct continuation of the speech Perhaps only one or two words were omitted, but they were not missed by the interlocutor, who probably understood the whole sentence and was hardly aware of the phenomenon Nor did any change of the body position take place On the contrary, in the critical moment the patient was motionless, and his eyes showed a glassy gaze or stared fixedly into space until familiar gesticulations and sounds returned

Many of the more outstanding attacks of unconsciousness were of the nocturnal type They were often observed by the parents because the patients would awaken worn and haggard, with no understanding of where they were One of the men, in addition to the many petit mal fits, had twice had typical grand mal seizures, confirmed by a good description made by an intelligent and reliable informant

These patients with an externally normal appearance were not always slow or mentally deteriorated, as they are sometimes described by other observers Up to the age of sixteen or seventeen they were bright and wide awake, interested in their surroundings, and full of hope for their own futures About that time a change gradually developed, but it was not a lowering of their intelligence On the contrary, the keener they became, the more they were convinced that they were fighting a losing battle

Fighting? For a long time, they were unaware of any hostility anywhere They had both been excellent students in high school, although they had instinctively avoided the sports and the games A mental depression appeared, and both boys tried to drown it or cover it up with new activities, each in a different manner They vaguely felt some social obstacles in their way X began to drink and to make merry with other young men—never with women Y plunged into reading—usually abstruse philosophic and mathematical works The latter grew indifferent to sex and uninterested in any gainful occupation Secretly, the former burned with a passion for

be referred to Dr Van Etten and received a courteous reply without any comment Then he sent it to Dr Conway who was interested and thought perhaps the State Medical Society would care to have the problem explored

It was voted that the Council refer the matter of future changes in the Workmen s Compensation Minimum Fee Schedule to the Workmen s Compensation Bureau with the hope that a yardstick will be evolved.

Meetings.—Since the June meeting of the Council, your Secretary has endeavored to perform his duties as specified by the Constitution and Bylaws He has notified members of your committees and subcommittees of their appointments He has answered correspondence and has attended three meetings outside New York City, the American Medical Association House of Delegates in Chicago, the Annual Meeting of New York State Health Officers at Saratoga, and a meeting of the Blood Bank Subcommittee of the Public Health and Education Committee in Albany

The August 9, 1948, Secretary's Letter from Dr George F Lull, Secretary and General Manager of the American Medical Association, states in part

CHANGE METHOD OF SELECTING GENERAL PRACTITIONER

With more and more attention being directed to the second annual A.M.A. Interim meeting to be held in St. Louis, November 30 to December 3 1948 attention is called to the resolution adopted by the House of Delegates at the Chicago session in June changing the method of selecting the outstanding general practitioner of the year The selection is made at the Interim Session.

The resolution, which was introduced by Dr E. S. Hamilton in behalf of the Illinois State Medical Society set out that the first award was made at the A M.A meeting in Cleveland last January, but was "marred by confusion and misunderstanding." The resolution said it was desirable to set up some definite procedure for the selection of the A.M.A. general practitioner of the year recommending that the selection originate at the county society level and proceed through state organizations so that local or state groups and individuals may pay tribute to the family physician of their choice

The resolution set in operation the following plan

1 Each county medical society shall be urged to name the candidate of its choice as the outstanding general practitioner for the year within its jurisdiction, basing its selection on nominations and recommendations from any responsible source lay or professional

2. The name of each candidate so chosen by a county medical society with all pertinent data, including recommendations of lay groups and individuals, shall be submitted by the county medical society to the state medical society of which it is a component part.

3 Each state medical society through whatever agency each may designate, shall select from among the candidates submitted by its component county medical societies one name to be declared the outstanding general practitioner within the state.

4. The candidate so selected at the state level shall be the sole candidate from that state, and his or her name with all pertinent supporting data shall be submitted to the Board of Trustees of the American Medical Association

5 The Board of Trustees shall select from the names submitted by state societies the names of three persons these names to be submitted in turn to this House of Delegates which shall select one name to be declared the outstanding general practitioner of the United States for the year

6 Any state medical society desiring to do so may establish and confer a suitable award, with fitting public ceremony on the physician it has named as the outstanding general practitioner of that state for the year

It is respectfully suggested that this matter be referred to the Medical Service Committee consisting of Dr Harry Aranow, chairman Dr Carlton E Werts, and Dr Laurance D Redway

In accepting the Report of Reference Committee on Report of Council Part V. Workmen s Compensation, the House of Delegates recommended approval in part as follows

We believe that the fees as promulgated on June 1, 1947 are inadequate in view of the present increased costs of living and of conducting medical practice We, therefore recommend that the Chairman of the Workmen s Compensation Board arrange for a yearly consideration and review of the fee schedule to bring it in line with the prevailing rates for medical service throughout the State of New York

The Secretary takes the liberty to recommend that the Council request the Workmen s Compensation Committee to take cognizance of this action of the House of Delegates.

It was voted that the report be accepted and recommendations adopted

Dr Anderton presented the following supplementary report which was adopted

The Secretary absented himself from the office for two weeks commencing Monday August 16, with the exception of one day On August 17 he attended part of the Convention of the Disabled Veterans Association and conferred with Dr Clayton Wood medical director Dr Wood agreed to include in his speech to the Association the fact that practicing physicians are eligible to care for service-connected disabilities when veterans insist.

The schedule of district branch meetings has been completed, thanks to Dr Hannon. They will be held according to the schedule published in the NEW YORK STATE JOURNAL OF MEDICINE August 15

Also your Secretary attended a meeting at the Grand Central Palace last week called by the Mayor and Mr Grover Whalen in regard to public education about atomic energy In that connection it gives me pleasure to commend very highly to you the exhibition now on the fourth floor of Grand Central Palace which portrays the theory of atomic energy in a very understandable way The Westinghouse Electric Company has a ten-minute lecture at half past every hour during the day and it is worthwhile going to the fourth floor to hear

It gives me pleasure to draw to your attention the fact that the magazine *Vital Speeches of the Day* of August 15 1948, contained an article entitled "The Doctor and Public Health, The Necessity of Blood Banks in this Atomic Age," by Dr Leo F Simpson

Treasurer's Report was accepted

Report of the Executive Officer

Dr Hannon executive officer reported verbally as follows

The arrangement and programs of the eight district branch meetings as the secretary has stated have been published in the JOURNAL. These meetings start next week and we will have a busy time for the next six weeks.

There was a meeting of the Legislative Committee last evening in this office We regret that Dr Aranow through illness could not attend but the meeting covered a great deal of material, and on the basis of the actions taken the members of the Committee and myself can go to work toward next year's legislation The actions of that committee necessitate that I take up with the various State departments the type of bill they desire to be presented next year at the legislature.

Reports of Committees

Constitution and Bylaws.—In the absence of Dr Reuling chairman, Mr Clearwater reported that the Medical Society of the County of Rockland had submitted a complete new constitution and bylaws The Medical Society of the County of Ontario sub-

mitted for consideration a new provision in their bylaws The Medical Society of the County of New York submitted an addition to their bylaws

It was voted to approve the alterations in the proposed new constitution and bylaws of the Medical Society of the County of Rockland, redrafting of the proposed alterations in the bylaws of the Medical Society of the County of Ontario, and the addition to the bylaws of the Medical Society of the County of New York

Convention —The report of the Convention Committee, Dr Aranow, chairman, was adopted as follows The 142nd Annual Meeting of the Medical Society of the State of New York was held at the Hotel Pennsylvania in New York City from May 17 through 21, 1948

Attendance —Over 6,000 registrations were recorded as follows physicians 4,396, guests 874, and exhibitors 750, making a total of 6,020

The physician registration numbered almost 3,700 members of the Medical Society of the State of New York, and the balance, nonmember physicians from many other parts of the globe The guests, for the most part, were dietitians, medical technicians, registered nurses, and others working closely with the medical profession

Scientific Program —Approximately 125 papers were read at the scientific meetings The Teaching Day program, arranged by Dr O W H Mitchell, was well attended The General Sessions, presided over by Dr Duncan W Clark, were filled to overflowing Many of the section meetings were conducted with part of the audience standing in the rear Only the physical limitations of the meeting rooms prevented larger attendance

Scientific Exhibits —Seventy exhibits, many of outstanding scientific value, drew a constant stream of physicians and much favorable comment The Scientific Award Committee gave a first prize, a second prize, and honorable mention in two classes—clinical research and scientific research Appropriate plaques were awarded to the winning exhibits by Dr J G Fred Hiss, chairman of the Scientific Exhibits *

Technical Exhibits —The large attendance of doctors and their interest in the attractive technical exhibits was appreciated by the exhibitors

Scientific Motion Pictures —The motion picture exhibit was handled in a new manner this year The Medical Film Guild arranged the program under the supervision of Dr Theodore J Curphey The capacity audiences at all the showings of motion pictures spoke well for this arrangement

Banquet —The Banquet and Annual Meeting, held Wednesday evening on the Penn Top, were attended by nearly 300 people The highlights of the banquet were the interesting addresses by the retiring president, Dr Louis H Bauer, and the guest of honor, Dr Roger I Lee of Boston

Woman's Auxiliary —The Woman's Auxiliary expressed pleasure at the enlarged facilities made available to them Their membership and needs are growing greater every year, and the Medical Society is glad to be able to comply with them and help in every possible way

The spirit of cooperation among the members of the staff and committees was felt among the exhibitors and section and session chairmen, who expressed themselves in praise of the arrangements made to fill their requirements

Economics —Mr Farrell, director of the Bureau of Medical Care Insurance, made the following report

June 19, 1948 Mr Farrell, director, attended a meeting of the Council on Medical Service of the A M A , at which time the Council asked for an expression from all state society presidents or their representatives on the advisability of establishing a national service corporation between Associated Medical Care Plans and Blue Cross The following three recommendations were passed at the meeting

1 That this body representing the constituent state medical societies of the American Medical Association go on record as approving in principle the organization of a national service agency for the enrollment of national accounts for medical and hospital service and to act as the agent for existing nonprofit medical and hospital plans with full cognizance of the local autonomy of state medical societies

2 That the matter of the organization of such an agency be referred to the Council on Medical Service and that they gain data and advise the states what action they should take

3 That the Council on Medical Service should call a meeting of this type each year

A report of this meeting was submitted to Drs Simpson, Wertz, and Aaron by Mr Farrell

June 20, 1948 Mr Farrell attended the Conference of Presidents at the Sheraton Hotel, Chicago

June 22, 1948 Mr Farrell conferred with Dr Paul R Hawley, chief executive officer of Blue Cross Commission, at the offices of Associated Medical Care Plans, Chicago, and on *June 23* attended the Conference of Medical Society Executives

June 24, 1948 The director had a conference with Dr Wertz in Buffalo and on *July 22* attended a meeting called by Dr Wertz and held at the Society offices to discuss the four specialty services provided under Blue Cross contracts

August 5, 1948 Mr Farrell conferred with Dr Aaron in Buffalo to discuss plans for fall meetings of Dr Aaron's Subcommittee on Medical Care Insurance, and on *August 7* called on Dr Ellis B Soble, president of the Medical Society of the County of Monroe, regarding the inclusion of anesthesia in Blue Cross contracts

At the request of Dr Elton R Dickson, Mr Farrell has arranged a round-table conference on Medical Care Insurance as part of the program of the Sixth District Branch meeting at Binghamton on October 6

A communication from Mr John F McCormack, executive vice-president of United Medical Service, addressed to Dr Anderton, regarding the use of the words "approved by the Medical Society of the State of New York" on United Medical Service letterheads was referred to Mr Farrell for discussion with Dr Aaron Dr Aaron is in favor of this—in fact, feels it would be good policy for all plans approved by the Medical Society of the State of New York to do likewise This phraseology is now being used by many approved plans in their descriptive literature

It was voted that the Council has no objection to the use of the phrase "approved by the Medical Society of the State of New York" on the United Medical Service letterhead

The regular quarterly progress report as of June 30, 1948, on the six voluntary nonprofit medical care insurance plans in the State approved by the Medical Society of the State of New York and prepared by Mr Farrell, follows

* See NEW YORK STATE J MED Part II September 1 1948 p 117

Membership on June 30, 1948, was 1,303,178 representing an increase of 279,563 members during the first six months This increase exceeds the same period of 1947 by 19 493 members.

Incurred benefits to participants for the first six months of 1018 were $2,858,405 as compared to $1,460,770 for the same period in 1947 The increase in benefits of $1,397 635 during this period was 95 68 per cent more than for the comparable period in 1947 Statements in detail are shown in the following tables

Albany plan are $3,500 for a family $2,000 for an individual, and under United Medical Service $1,800 for an individual and $2 500 for a family

'Due to increases in wages and labor demands the tendency is growing for plans writing service contracts to increase income levels which, if satisfactory to labor groups will perhaps decrease agitation for some form of compulsory socialized medicine, but an increase in income levels will necessitate increases in indemnity schedules and premium rates to permit higher fees by the plans to physicians

TABLE 1 —MEMBERSHIP PROGRESS ACCORDING TO TYPES OF CONTRACT—QUARTER ENDING JUNE 30 1948

Type of Contract	United Medical Service, Inc., New York	Western New York Medical Plan, Inc., Buffalo	Medical and Surgical Care, Inc Utica	Central New York Medical Plan, Inc., Syracuse	Genesee Valley Medical Care Plan, Rochester	North-eastern New York Medical Service Inc., Albany	Totals
Surgical Only							
June 30, 1948	719 460	115,620		3 173	57 158		895 411
Mar 31, 1948	639 145	106 152		2,340	50 962		798,605
Increase	80,315	9 468		827	6 196		96,806
Surgical-in hospital med'cal							
June 30 1948	190 156	21,838				38 605	250 609
Mar 31 1948	158,539	22 627				30 017	211 183
Increase	31 627	—789				8,588	39 426
Surgical medical home office, hospital							
June 30 1948	40,207			16,020			56,287
Mar 31 1948	34 729			13 580			48,309
Increase	5,538			2 440			7 978
Surgical-special benefits plan III							
June 30, 1948			15 978				15 978
Mar 31 1948			17,287				17,287
Increase			—1,309				—1,309
Surgical-special benefits plan IV							
June 30 1948			84,247				84 247
Mar 31 1948			77,096				77 096
Increase			7 151				7 151
Medical expense fund and ward							
June 30, 1948	646						646
Mar 31 1948	709						709
Increase	—63						—63
Grand Totals (June 30 1948)							
Membership	950 539	137 458	100,225	19 193	57 158	38,605	1,303 178
Increase	117 417	5 679	5 84	3,267	6 196	8,588	149 939

TABLE 2.—MEMBERSHIP PROGRESS ACCORDING TO CLASS OF PARTICIPANTS—QUARTER ENDING JUNE 30 1948

Class of Participants	United Medical Service Inc., New York	Western New York Medical Plan Inc., Buffalo	Medical and Surgical Care Inc. Utica	Central New York Medical Plan Inc., Syracuse	Genesee Valley Medical Care Inc., Rochester	North eastern New York Medical Service, Inc. Albany	Totals
Subscribers	486,287	53,994	48,844	8,012	24 441	16,867	638,445
Dependents	464,252	83,464	51,381	11,181	32,717	21,738	664 733
Totals	950 539	137 458	100,225	19 193	57 158	38,605	1,303 178

Mr Farrell supplemented the report by stating that on July 9 Dr Heyd president of United Medical Service, wrote to the 17 county medical societies in U.M.S operating area, the New York Academy of Medicine, and Dr Anderton regarding increase in income levels on service contracts Dr Anderton referred the matter to Dr Aaron, who requested comments from Mr Farrell

Mr Farrell s comments were in part as follows "The State Society has approved United Medical Service and Northeastern New York Medical Service (Albany) which are writing service contracts' that the maximum incomes allowed by the

TABLE 3 —MEDICAL CALL RIDER (OPTIONAL BUT ISSUED AS SUPPLEMENTAL COVERAGE TO PLANS III AND IV)

Plans III and IV—Low Cost	
June 30 1948	37 927
Mar 31, 1948	34,297
Increase	3 630
Plan IV—High Cost	
June 30 1948	3 051
Mar 31 1948	3,113
Increase	—62
Grand Total Increase	3 568

TABLE 4 —FINANCIAL PROGRESS—QUARTER ENDING JUNE 30 1948

Plan Location	Earned Premium Income	Claims Incurred	Expenses Incurred	Reserve Deferred Maternity Benefits	Liabilities and Reserves for Unpaid Surgical and Medical Claims	Statutory Reserve	Unassigned Surplus	Net Surplus
New York								
June 30	$2,940,278	$1 937,290	$637,119	$800 000	$540 000	$433,804	$902 509	$1,336,313
Mar 31	1 386 145	794 397	285 037	800 000	450 000	367,555	859 156	1,226 711
Increase	$1 554 133	$1,142 893	$352 082		$ 90 000	$ 66 249	$ 43 353	$ 109 602
Buffalo*								
June 30	$ 462 016	$ 321,105	$ 51,230	$ 86 740	$106,131	$125 549	$ 83 911	$ 209,460
Mar 31	223 612	151 851	24 590	77 240	99 535	116 077	90 423	206 500
Increase	$ 238 404	$ 169 254	$ 26 640	$ 9 500	$ 6 596	$ 9 472	$—6,512	$ 2 960
Utica								
June 30	$ 385,267	$ 306 634	$ 56 611	$ 92 283	$171 337	$ 93 461	$163 606	$ 257,067
Mar 31	186 714	147,198	26 834	92 283	164 324	85 519	159 681	245 200
Increase	$ 198 553	$ 159 436	$ 29 777		$ 7 013	$ 7 942	$ 3 925	$ 11 867
Syracuse								
June 30	$ 91,081	$ 68 904	$ 11 928	$ 4 209	$ 30 140	$ 13 804	$ 43 322	$ 57 126
Mar 31	42 981	32 145	5 723	4 209	27 578	11 880	39 661	51 541
Increase	$ 48 100	$ 36 759	$ 6 205		$ 2 562	$ 1 924	$ 3 661	$ 5 585
Rochester								
June 30	$ 167 151	$ 120 947	$ 24 349	$ 40 642	$ 68 337	$ 16 963	$ 57 302	$ 74 325
Mar 31	77 889	45 762	9 774	32,062	49,546	13 357	57,779	71 136
Increase	$ 89 262	$ 75 185	$ 14 575	$ 8 580	$ 18 791	$ 3 606	$ —417	$ 3 189
Albany								
June 30	$ 132 981	$ 103 525	$ 15 385	$ 10 000	$ 54 027	$ 9 807	$ 14,279	$ 24 086
Mar 31	56 669	41 698	6 206	3 750	33 656	6 109	18 922	25 031
Increase	$ 76 312	$ 61 827	$ 9,179	$ 6 250	$ 20 371	$ 3 698	$—4 643	$ —945

* During this period payments in the amount of $32 459 02 were made to member physicians covering contingent balance for years 1941, 1942, and 1943 from unassigned surplus

TABLE 5 —CLAIM DATA—YEAR TO JUNE 30 1948

Plan Location and Types of Contracts	Number of Claims	Amount	Ratio to Earned Premium	Average Cost per Claim	Claim Incidence per 1 000 Participants per Annum	Average Exposure Participants
New York*						
Surgical Expense Indemnity	22,189	$1 378 936	69 86	$62 14	65 5	677,291
Surgical-In Hospital Medical	5 474	306 829	46 04	56 04	63 2	173,176
General Medical	11 579	149 538	51 59	12 91	611 5	37,867
Total	39,242	$1,835 303	62 41	$46 77		
Buffalo*						
Surgical	6,787	$ 213 515	65 88	$31 45	122 4	110 886
Surgical-In-Hospital Medical	3 957	87 987	63 79	22 23	355 8	22,238
Total	10 744	$ 301 502	65 25	$28 06		
Utica						
Plan III Surgical and Special Benefits	1,899	$ 50 450	57 87	$26 56	22 83	16 632
Plan IV Surgical and Special Benefits	9 066	256 184	85 93	28 25	224 7	80 671
Total	10 965	$ 306 634	79 58	$27 96		
Syracuse						
Surgical	208	$ 6 274	70 65	$30 16	150 9	2,756
Surgical and Medical	4 406	62 630	76 09	14 21	595 4	14 800
Total	4 614	$ 68 904	75 65	$14 93		
Rochester*						
Surgical Expense Indemnity	2 126	$ 78,774	75 05	$37 05	81 7	52 020
Albany						
Surgical-In-Hospital Medical	2 283	$ 103 525	77 84	$45 34	133 0	34 311
Grand Total	69 974	$2,694 642	64 57	$38 50		

* Paid basis all others on incurred basis
NOTE Experience of Medical and Surgical Care, Utica includes benefits under medical call rider

which would be consistent with normal charges for nonsubscribers with comparable incomes

"I am aware of abuses experienced in offering service contracts, but believe that with control in the hands of the medical profession a fee schedule could be worked out which would have sales appeal and furnish fair compensation to the doctors for services rendered

"A check of the county or state society-approved plans in the United States disclosed that approximately 26 are on an indemnity basis and 32 on service, that income levels vary from $2 500 to

$5,000 for a family Medical-Surgical Plan of New Jersey is going to offer a new contract on a service basis up to incomes of $5,000 regardless of marital status and is increasing indemnity schedule and premium rates by approximately 50 per cent."

The supplementary report was presented at the request of Dr Aaron who stated that after further study by his Subcommittee, a report would be presented at a later Council meeting

Malpractice Insurance and Defense Board.—Dr Leo F Schiff chairman, sent the following report under date of August 31 1948

Reference is made to the directive of the House of Delegates that a study be made of the Alameda County (California) Medical Association s malpractice claim prevention program which was referred to this Board by the Council on June 30, 1948

A preliminary study of that program indicates that it is primarily an ambitious and far reaching venture into the fields of public relations and medical economics and whatever success has been achieved in reducing malpractice costs has been a corollary of the improvement in public relations Nevertheless the reduction in the number and cost of malpractice actions has been tremendous, as reported by the A C M.A. *Bulletin* and for that reason alone, the plan ' should have careful study

Because of the scope of the program and the many activities it involves, the Malpractice Insurance and Defense Board has concluded that before definite and comprehensive recommendations can be made to fulfill the directive of the House of Delegates, a detailed study of the entire program should be made in Alameda County by a special committee Such a committee might well be composed of one member of this board, and its secretary together with a member of the public relations committee of the State society and the legal counsel or his representative since the laws of California, and their application to malpractice may have some important bearing on the situation in that state

This Board has received information showing that during the first six months of 1948, 33 more suits were begun than during the corresponding period of 1947, necessitating an increase of reserves for outstanding suits and claims by approximately $100 000 This is a dangerous situation, and the Board believes that prompt action to halt this spiral of increasing costs is urgent.

This Board therefore, recommends that such a committee be authorized to carry out the study as soon as possible and that an appropriation be obtained of the funds necessary to cover the expenses of the committee

A copy of the preliminary study referred to in the second paragraph is enclosed for the information of the Council

To Members of the Malpractice Insurance and Defense Board

SUBJECT: Alameda County Medical Association Program

"By direction of the House of Delegates, the Malpractice Insurance and Defense Board is required to investigate the malpractice prevention programs adopted by the Alameda County (California) Medical Association and other medical organizations to determine whether any of the measures being tried elsewhere can be adapted to good advantage to our situation in New York State

"This directive was inspired by a resolution offered by Dr Frederick Wetherell of Syracuse, who is the editor of the *Onondaga County Bulletin* He has been in correspondence with the authorities of Alameda County Medical Association and is impressed with the efficacy of their program as described in their county bulletin I have subscribed to the A C M.A *Bulletin* and secured copies of the recent issues which referred to their malpractice prevention plan. Their plan apparently has been adopted by four of the other "bay' counties around San Francisco and Oakland.

"Alameda County includes both Oakland and Berkeley The population of the county is not known but the membership of the A.C M A. is between 900 and 1,000 only 483 of whom are insured in the A.C M.A. plan Before the plan was inaugurated the cost of $25,000/$75 000 limits was $126 plus $31.50 ' for the first nurse" or a total of $157.50 During the two years the plan has been in operation there has been no 'untoward experience,' and, as a result, premiums for those limits have twice been reduced 10 per cent making the present rates $55.80 including the first nurse which would indicate that the initial rate under the plan was $69 75

Malpractice claim prevention is only a corollary part of the A C M.A. program which is an ambitious venture into wide fields of public relations and medical economics providing many services to the public and members of the Association part of which is advertised in the public press Among these services are the following

'1 Guaranteeing to every person in the county competent medical care regardless of ability to pay

"2 Twenty four hour services by telephone for persons requiring immediate medical care

' 3 Operation of a blood bank with all types immediately available to everyone regardless of ability to pay

4 Adjustment of all differences between patients and their doctors, including fees and claims for malpractice This includes answering all questions about the rights of the patients and directions where to go for the type of medical service required.

5 Collection service for members which undertakes to study the economic situation of the patients involved and to maintain a credit rating service. This includes a patient s account financing service and a postpayment plan

"6 Advice on practically everything involving the economic side of a member s practice, including accounting and office methods, auditing, forms, monthly billing service, tax advice, and assistance.

'7 Distribution of medical care office space equipment, nurses, secretaries and assistants.

'8 Reservations for hotels and transportation.

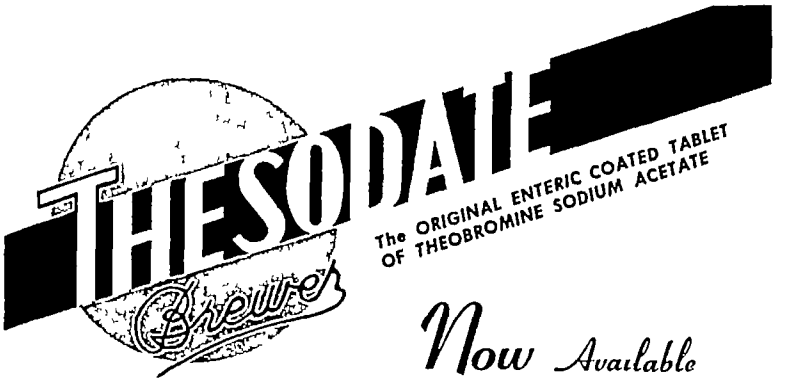
'9 Malpractice insurance, defense and advice

'10 Health and accident insurance

'These are only part of the direct individual services which are in addition to the general public health and community activities

"To establish these services, apparently, it was necessary to revamp the whole Association including the method of electing officers. Many of these services are furnished by committees of members. In the case of the adjustment of various claims against members there are four committees scattered about the county In addition there are more than 30 full-time, lay employes.

'It is stated that, in dollar value the various activities of the Association are close to half a



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[Continued from page 2514]

Another most interesting paper was read by a dentist, Dr A Lexington Jones, from Christchurch, New Zealand, who gave a nine-year summary of government medicine in New Zealand and its social, economic, and political implications—a most informative paper from a man who has lived there for ten years

Mr Stewart Hayden, former foreign editor of the Scripps-Howard newspapers, and who is currently of the National Press Club in Washington, also delivered a very interesting paper

Dr Irons addressed the conference and alluded briefly to experiences in Tokyo He is not permitted to make any statements until General MacArthur releases the report, but he said the implications to him were quite encouraging

The chairman of the Public Opinion Poll from Princeton, Dr Claude Robinson, gave an excellent talk on what we should do to push our program and how we should do it

Representative Busbee, of Illinois, long a member of the Un-American Affairs Committee of the House of Representatives, way back from the days of its inception, gave an interesting discussion of the activities of the communists of the United States

All of these papers are going to be printed I think the organization is doing an excellent job, and I am sure something will come out of it that will be of interest

Publication—Dr Anderton reported for Dr Kosmak, who had to be out of town

The Publication Committee met Tuesday, September 7 A number of routine matters were taken up Among others that the Council would like to know about I believe was that approval was voted for the omission of advertisers' names from the published minutes of the 1948 House of Delegates, including those mentioned in Dr Bauer's speech It was felt that to broadcast the names of advertisers who were being criticized by the profession would be a mistake Mr Anderson announced that the 1949 Directory would be delivered to members by approximately February 15, 1949

Dr Redway stated that it may be of interest to the Council members to know that the October 1 issue will start a new page service to appear in every issue of the JOURNAL on facts about nutrition, prepared by the School of Nutrition, Cornell University, of which Dr Norman S Moore is director It will run for 24 issues of the JOURNAL and will condense into a handy form for practitioners and anybody who wishes all of the present knowledge concerning the mechanism of the utilization of food which it is possible to get into a single page in each issue

It was voted to accept the report

Public Health and Education.—The report as distributed with the agenda is as follows

Activities of the Chairman—June 21, 22, 23, and 24 Attended meeting of the House of Delegates of the American Medical Association in Chicago

June 23 In Chicago, addressed a meeting of the Associated State Postgraduate Committees on the subject "The Postgraduate Medical Education Program of the Medical Society of the State of New York"

July 9 In New York City a meeting was held to discuss several phases of the problems of civilian defense, blood banks, atomic energy, and related subjects In attendance were some of the members of the newly appointed Emergency Preparedness Committee, some of the officers of the Medical Society of the State of New York and representatives of the New York State Department of Health and the City of New York Department of Health

Following this meeting, the president of the Medical Society of the State of New York appointed the following physicians as members of a Subcommittee on Blood Banks, Lester J Unger, chairman, New York City, Eugene L Lozner, Syracuse, and Morris Maslon, Glens Falls

This Subcommittee, if approved at the meeting of the Council on September 9, 1948, will consider the plan of the American National Red Cross to establish a nation-wide blood donor service program to provide free blood

July 16 In Syracuse conferred with Mr C A Millspaugh, executive assistant to the New York State Commissioner of Health, concerning the material for the page devoted to the activities of the Medical Society of the State of New York which appears in the *Health News*

July 21 In Saratoga to attend the annual meeting of New York State Health Officers

July 28 A meeting of the Subcommittee on Blood Banks was held in Albany Present at this conference, in addition to the members of the Council Committee on Public Health and Education and the Subcommittee on Blood Banks, were some of the officers of the Medical Society of the State of New York, some of the members of the Emergency Preparedness Committee, and representatives of the New York State Department of Health and the City of New York Department of Health

August 27 In New York City a meeting of the Subcommittee on Blood Banks was held with representatives of the American National Red Cross Also present at this meeting were members of the Council Committee on Public Health and Education, the Emergency Preparedness Committee, and representatives of the New York State Department of Health and the City of New York Department of Health

Postgraduate Instruction—Arrangements have been completed for postgraduate instruction to be presented in the following counties Allegany, Cayuga, Onondaga, Orange, Otsego, Richmond, Schoharie Steuben, Sullivan, and Tompkins

The Monroe County Medical Society will have a meeting on November 11, 1948, in Rochester and has requested us to arrange for five speakers

Arrangements have been made for a speaker for a joint meeting of the Syracuse and Rome Academies of Medicine to be held in Rome in the near future

The *1948–1949 Course Outline Book* will include a special announcement on the subject of medical aspects of radioactive materials Letters were sent to the deans of the medical schools in New York State requesting them to submit the names of one or two members of their faculties who would be available for lectures at meetings of county medical societies and other medical groups

Blood Banks—In the absence of Dr Mitchell, Dr Simpson spoke on the subject of Blood Banks

After discussion, *it was voted* that Dr Simpson be empowered to send a letter to the presidents of the county medical societies stating that since the meeting of the House of Delegates, further studies have been made with the result that at present it seems that the Red Cross is going to function in New York State, that it is for the county societies

[Continued on page 2518]

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* Wooldridge, W E. The Gamma Isomer of Hexachlorocyclohexane in the Treatment of Scabies, J Invest. Dermat. *10*:363 (May) 1948

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[Continued from page 2516]

to cooperate and assume their responsibility in the medical aspects (which apparently the Red Cross wants), and that there is no objection to the formation of other blood banks in New York State under private or hospital auspices, free or paid

The appointments by the president of Dr Lester J Unger, Dr Eugene L Lozner, and Dr Morris Maslon were approved as the Subcommittee on Blood Banks

Public Relations.—Dr Winslow, chairman, presented the following report

On June 4, Mr Anderson visited the Kingston-Newburgh area to study the public relations setup there

Mr Miebach and Mr Walsh attended the Public Relations Conference of the Medical Society of New Jersey at Trenton on June 13 Both spoke in connection with the coordination of the public relations of county societies with the state society program

Dr Floyd S Winslow, chairman of the Committee on Public Relations, Mr Anderson, Mr Walsh, and Mr Miebach represented the Public Relations Bureau at the annual A M A meeting in Chicago, June 19 to 25 During the course of the meeting the personnel of the Public Relations Bureau assisted in maintaining a headquarters for the New York State delegation at which delegates from various sections of the country were entertained Mr Anderson, Mr Walsh, and Mr Miebach also attended the Medical Executive Secretaries Conference on June 23 in Chicago, and Mr Anderson was one of the speakers in a round-table discussion regarding administrative problems of medical societies

Mr Anderson prepared an article for the summer issue of *The Distaff* The issue was mailed by the Public Relations Bureau

Concurrently with an address made by Dr Leo F Simpson, president, before the Oneida County Medical Society in Utica, New York, on June 13, the Public Relations Bureau issued a news release based upon the text of Dr Simpson's talk On July 27 another news release was issued, this time on the appointment of a Blood Bank Committee by Dr Simpson

Dr Winslow, Mr Walsh, and Mr Miebach represented the Public Relations Bureau at the Annual Conference of Health Officers and Nurses at Saratoga Springs on July 21 to 23 At this conference Dr Simpson delivered an address, "The Doctor and Public Health" News coverage for this speech was arranged in cooperation with the press bureau of the State Health Department, and subsequently the talk was published in the August 15 issue of "*Vital Speeches of the Day*" Copies of this publication were sent to officers, members of the Council, and trustees, and 25,000 reprints were secured for mailing to a selected list of important individuals and organizations throughout the State

The Public Relations Bureau received prior notice of publication in the July 24 issue of the *Saturday Evening Post* of an article entitled, "They're Trifling with Your Life," dealing with the activities of antivivisection promoters Arrangements were made with the circulation department of the *Saturday Evening Post* to obtain a summary of the article, which was sent out on July 20 with a News Letter calling it to the attention of the membership of the Society

Following receipt of a request from Lois Mattox Miller, medical writer for the *Reader's Digest*, for material for a proposed article on blood banks, the Public Relations Bureau arranged a conference in the Society's offices on July 9 At this conference, attended by those most vitally interested in the blood bank situation, the blood bank question was discussed in detail Subsequently, a statement on the Society's blood bank policy was prepared in draft form and mailed to a selected list for comment Replies received by the Bureau indicated a mixed reaction Consequently, it was decided to hold the statement in abeyance

The following postgraduate sessions, held under the auspices of the Committee on Public Health and Education, were covered by releases to the press Allegany, Cayuga, Chenango, Jefferson, Oneida, Ontario, Otsego, Rockland, St Lawrence, and Suffolk

In addition, two special releases were mailed One concerned the rise in membership in voluntary medical care plans in New York State The other was a statement made by Dr J Stanley Kenney with relation to action of the State hospital planning commission

A communication has been received from Dr Morris Weintrob enclosing a copy of a publication known as *Health Forum*, published by the Flatbush Medical Group, affiliated with the Health Insurance Plan of Greater New York Dr Weintrob asked to be advised regarding the ethics involved, inasmuch as the publication is in the nature of advertising It is the recommendation of this Committee that the matter be referred to the Council for appropriate action condemning this type of publicity as unethical and that the Secretary be directed to write a letter of protest

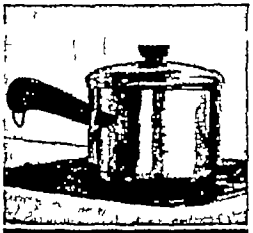
It was voted that the Council send a letter of protest to this group against *Health Forum*, volume 1, issue 1, July, 1948, that has been presented to the Council, that in it we state why we feel the publication is unethical, and that a copy of the letter be sent to the Kings County Society and to Dr Weintrob

Mr Walsh attended the convention of the New York State Department of the American Legion at Saratoga in an effort to determine what position the Legion is taking on the continuation of the Veterans Medical Service Plan of New York The general sentiment is definitely in favor of continuing the plan, but few if any Legionnaires, with the exception of those who have had dealings with the Veterans Administration, are aware that the plan has not been renewed for 1948 and 1949 Some of the members of the executive board discussed the possibility of having a resolution drawn up and presented to the convention which would put the Legion on record as favoring the continuation of the plan, but unfortunately the rules of the convention did not permit such action at so late a date It was decided that the matter would be submitted to the executive committee at its midwinter meeting in January and that the body would be requested to go on record urging the Veterans Administration to continue the services that are now available to all the veterans of New York State under the Veterans Medical Service Plan of New York

Woman's Auxiliary—Dr Beekman, chairman, reported as follows

I attended the meeting of the Executive Committee of the Woman's Auxiliary yesterday in which the ladies discussed their activities for the coming year There was one question that they wished me to present to the Council, and that was the relationship of the chairmen of the advisory committees of the county medical societies to the comitiae minora of the counties It seems that in many of the counties,

[Continued on page 2520]



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[Continued from page 2518]

or most of the counties, the chairman of the advisory committee is not a member of the comitia, therefore, in many ways there is not the close touch between the woman's auxiliary of the county and the comitia minora that there should be They asked me to bring to your attention this matter and to suggest that the Council go on record as recommending that the chairman of the advisory committee of the woman's auxiliary of the county medical society be selected from among the members of the comitia minora of the local societies so as to have that desired tie It is just a recommendation so as to make a real contact between the auxiliary and the county society

It was voted that the Council transmit to the president of each county medical society the recommendation that the chairman of the advisory committee on woman's auxiliary be a member of the comitia or invited to attend comitia meetings

Workmen's Compensation.—Dr Kenney, chairman, reported as follows

I attended a meeting on June 30 of the Advisory Council to Miss Donlon and her Workmen's Compensation Board There was no matter brought up in that particular meeting that required attention or any action of the Medical Society

The report for the Committee consists chiefly in the activities of the Bureau during the summer, and I am not going to read it, but I will give it to the recorder for inclusion in the minutes There are a few titles in it though that I think warrant a brief discussion, and I am going to ask Dr Kalski to do that as briefly as possible

REPORT

Case of Wrong Diagnosis.—An interesting case involving a question of incorrect diagnosis, based upon symptoms and signs sufficient to warrant the diagnosis made, in which an insurance carrier authorized an operation for epigastric hernia but which at operation subsequently turned out to be a small lipoma in a traumatized area, has recently come to our attention

The diagnosis had been concurred in by three physicians When the physician reported the operative findings, the carrier refused to pay for the operation which had been authorized It was the doctor's contention, and in this we concur, that the patient suffered an accident under the Workmen's Compensation Law, that he presented symptoms and signs which could be related to an epigastric hernia, and the diagnosis was concurred in by a number of physicians All this was done in good faith, and we are supporting the physician's claim for the payment of his bill of $100 allowed for epigastric hernia

In another instance a physician made a diagnosis of inguinal hernia The insurance carrier authorized operation Here too, the signs and symptoms were sufficient to warrant a strong probability of inguinal hernia Patient had suffered a compensation injury At operation the physician found a cystic growth in an inflamed area This was removed. Carrier refused to pay for the operation claiming that the patient had not sustained an inguinal hernia and this despite the fact that they had authorized operation They cited the case of Van Wess *vs* Nurnberg Thermometer Company, 266 App Div 1050

After consultation with attorneys we contended that this decision was not binding or pertinent, as in this particular case the claimant was denied compensation for a hernia which was not present Granting in this case that no hernia was present, the symptoms were such as to lead a competent physician to make such diagnosis, and the operation was performed in good faith after authorization had been given The doctor is not a guarantor of his diagnosis or of the success of his operative work The diagnosis was made in good faith and concurred in by other physicians before operation Patient's symptoms justified the diagnostic conclusions

It is our contention that unless the bona fides of the doctor can be successfully attacked, the carrier is liable for payment of an authorized operation The law imposes certain requirements on the doctor He must obtain authorization before operation The carrier is entitled to examination before operation if circumstances permit It is not known in this case whether the carrier availed himself of the examination, but it did give authorization, and this implies a contractual relationship between the doctor and the authorizer The operation indeed served the purpose of enabling the carrier to ascertain whether or not the patient actually suffered a hernia or an aggravation to a pre-existing condition This evidence is available for the protection of the carrier's interest at the time of the hearing on liability for a hernia This bill was submitted for arbitration, but since arbitration decides the value of the physician's services and not questions of liability or compensability, it was decided that arbitration could not take place under the circumstances

Authorization for Qualification in Metropolitan Area.—There has been considerable dissatisfaction in the counties of New York, Kings, Queens, and the Bronx with the way in which the Medical Practice Committee has acted upon the recommendations of the county medical society workmen's compensation committees regarding physicians who have applied for compensation ratings or changes in ratings and who subsequently receive final authorization through the Medical Practice Committee as required by law In many instances the final judgment of the Medical Practice Committee was not in accordance with the recommendations made by the county societies, and the committees were not notified of the difference of opinion before the Medical Practice Committee took final action This was discussed at a meeting of the Coordinating Council early this year when it was decided to send a committee to meet Miss Donlon and discuss the matter with her Such a meeting was held on May 27, 1948 Your chairman appeared with the Committee.

Medical Bureaus— Voluntary Hospitals.—On June 9, Communication 79 was sent to the chairmen of the workmen's compensation committees of each county society asking for information on the voluntary hospitals which had applied for licenses to conduct x-ray laboratories in accordance with the provisions of the 1947 amendment of Section 13-c 2 of the Workmen's Compensation Law We asked for information as to the number of hospitals which had applied and what action had been taken by the county societies Thirty-nine counties have replied We have not heard from the counties of Bronx, Chenango, Columbia, Essex, Franklin, Genesee, Jefferson, Kings, Lewis, Montgomery, New York, Oneida,

[Continued on page 2522]

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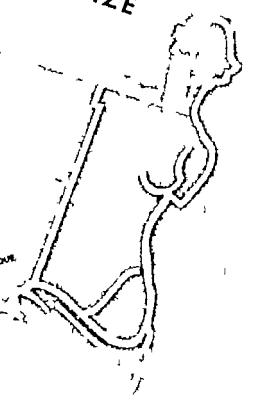
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[Continued from page 2520]

Orleans, Putnam, Saratoga, Schenectady, Schoharie, Tioga, Tompkins, Warren, and Yates Of these 39, 15 have replied that no applications have been received from voluntary hospitals In the other 24 applications have been received from 44 hospitals

General Practitioners Performing Major Operations (*X*) —An insurance carrier objected to a bill of a physician with a rating of X, general practice, who performed a major surgical operation Investigation showed that the physician in question called in a qualified surgeon to perform the operation and submitted a bill to the insurance carrier for the operation in his own name Presumably, there was an arrangement whereby the operating surgeon was compensated by the attending physician This, however, is unknown to us This matter was referred to the chairman of the Workmen's Compensation Committee of the county medical society who stated that the doctor was not qualified as a surgeon and also stated that he believed the complaint of the insurance carrier was justified The matter was taken up with the physician who, in his reply, stated that he thought it was common practice for general practitioners in like circumstances to call in a surgeon to operate and for the general practitioner to assist the surgeon, and then to continue in the aftercare of the patient, rendering the bill for the services

This matter was referred back to the county society for a hearing The Workmen's Compensation Law definitely states that the physician must confine his practice to what he is qualified to do and what the county society compensation committee recommends that he be authorized to do

In obtaining authorization to treat compensation claimants, the physician agrees to limit his practice to such medical care as his experience and training qualify him to render Section 13-d of the Workmen's Compensation Law permits the medical society to recommend the removal of a physician from the authorized list if he exceeds the limits of his qualifications or is guilty of professional or other misconduct which may be indicated by the practice of calling in a surgeon and rendering a bill for services performed by another person We have recommended that the entire matter be reviewed by the full compensation committee of the Medical Society which should also enquire into the legal and ethical questions involved This undoubtedly will be done and reported on later

New Fee Schedule —On May 8, 1948, we were informed by the chairman of the Workmen's Compensation Board that the Advisory Committee on Revision of the Workmen's Compensation Fee Schedule had concluded its studies, and as a result of their recommendations based upon suggestions made at open hearings and thereafter, the chairman, on their unanimous recommendations, had adopted a new fee schedule

The fee schedule is labeled Medical Fee Schedule and becomes effective September 1, 1948 There is an addendum on the cover which states that it is a schedule of minimum charges for medical treatment and care established for the entire State

This, in effect, establishes the principle approved by the Council that the fee schedule is a minimum fee schedule under the provisions of the Workmen's Compensation Law

The schedule is printed in attractive format It consists of 995 items Items 1 to 8 were made effective for all cases injured on or after June 1, 1947 The remaining items become effective in all new cases arising on and after September 1, 1948, and in old cases reopened on and after September 1, 1948

Full credit is given to the prodigious work of the Advisory Committee of which Dr Nathan B van Etten was chairman and Dr W P Anderton one of the members The booklet also contains extracts from the Workmen's Compensation Law, explanatory notes emphasizing the principle of free choice, and states unequivocably that, where authorization for medical services costing more than $25 has been unreasonably withheld, the Workmen's Compensation Board is required to determine whether the requested services were necessary

There are a number of items in the Fee Schedule which require clarification by the chairman of the Workmen's Compensation Board We are endeavoring to arrange a meeting with the chairman and other interested parties to discuss these at an early date

Fee for Nonspecialistic Treatment —A situation that frequently arises is where a specialist treats a patient not necessarily requiring the attention of a specialist and charges a specialist's fee Many insurance carriers object to paying specialist fees in minor injuries Under the Workmen's Compensation Law a patient is entitled to treatment by a specialist, and a specialist may charge the scheduled specialist fees for such treatment. There is no prohibition against a patient directly visiting a specialist in surgery or orthopedic surgery, for example, rather than going to a less qualified physician for treatment Under the old fee schedule the situation did not often arise in regard to the (SA) surgeon because there was no differential between the surgeon's fee and the general practitioner's fee for aftercare The situation did arise frequently where patients with minor injuries went to orthopedic surgeons (SB) whose fees were higher than those of the surgeon or general practitioner

The question is—if a specialist directly accepts and treats a patient with a minor injury, is he entitled to a specialist fee or a regular general practitioner's fee? The situation will arise more frequently in the future because the surgeons' fees have been increased in the new schedule and are greater than those of the general practitioner The dispute does not arise when a patient is referred by a general practitioner to a specialist for treatment It will arise more frequently under the new fee schedule and will have to be resolved in a reasonable and equitable way Many specialists in the past whose bills have been objected to have accepted the general practitioner's fee where the injury was of a minor nature and particularly when the injury did not follow directly within the specialist's field It is our opinion that where a surgeon treats a compensation claimant under the new fee schedule, he should be paid a specialist's fee regardless of the nature of the surgical injury because the patient is assured of the services of a specially qualified physician and certainly the expert is entitled to the regular specialist's fee provided the patient falls within the specialty Should a condition not fall within the specialty and the specialist elects to treat the patient, then we believe the general practitioner's fee should be

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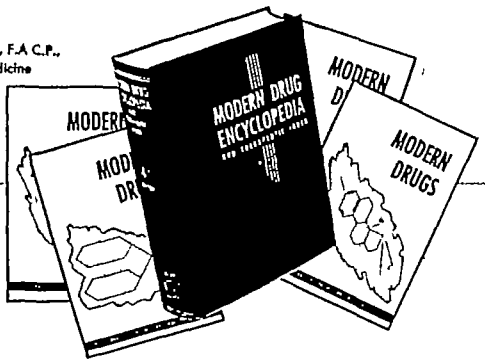
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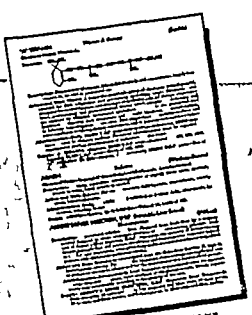
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[Continued from page 2522]

paid Some thought should also be given to the practice of some specialists in treating patients not within their specialties and how far a specialist may go in this respect and retain his specialty rating

Medical Questions by Lay Representatives of Insurance Carriers —After the receipt of a number of complaints from physicians against a large insurance carrier because of the way in which their lay claim representatives were contacting the physicians and discussing indications for treatment, number of treatments, type of treatment, and other matters relating to medical practice and medical bills, we conferred with the manager of the insurance carrier and succeeded, we believe, in correcting the unethical and improper practices This was a recrudescence of a situation which was very bad a number of years ago and was corrected at that time as a result of our intervention

It is the practice of certain insurance carriers to permit lay individuals to argue medical questions with physicians rather than turn these matters over to their medical personnel This causes bad relationships between the profession and the carriers who indulge in these practices We are of the opinion, however, that there are now better relationships with the majority of insurance carriers, many of whom consult our bureau on most questions of medical practice and billing

The setting up of joint councils in the various districts of the State and the State Joint Council have had and will continue to have an important effect in doing away with these practices and improving relationships Only recently the Erie County Medical Society Compensation Committee refused to recommend a medical bureau license for a large industrial plant in Erie County The decision of the county society was based on a very careful investigation which disclosed certain practices in the plant which needed correction When the matter was brought to our attention, we were in touch with the industrial concern whose offices are in New York City and succeeded in bringing together the parties The employer conceded the practices were not to the advantage of the injured workers and is in process of correcting same

This points out the importance of careful investigation by county medical societies on all applications for medical bureau licenses The highly efficient and courteous way in which this matter was handled by the chairman of the Workmen's Compensation Committee of the Erie County Medical Society deserves commendation

Authorization in Metropolitan Area —There has been a tendency of late for certain county medical societies in the metropolitan area aiding the Medical Practice Committee in the qualifying of specialists to insist upon such practitioners obtaining a diploma of a specialty board before recommending the physician for specialist rating We believe this is not a good practice

The county societies outside the metropolitan area are boards of original jurisdiction and have their own standards with which to gauge the qualifications of physicians These should be strictly adhered to The diploma of the Medical Board may be accepted as one evidence of qualification, but to refuse qualification to a physician who has all the qualifications specified in the standards which are the equivalent of the National Board requirements would be improper and would surrender to the National Board the functions of the county qualifying committees in workmen's compensation Indeed, it may be the basis for the State requiring such National Board diplomas and limiting specialists ratings to possessors thereof, making the functions of the county medical society superfluous

Rule 19 —We wish to draw attention to the fact that in the addendum to the Workmen's Compensation Law issued in July, 1947, by the New York State Workmen's Compensation Board on page 213, Rule 19 on Rules and Procedure Relative to Medical Surgical Care for Treatment under the Workmen's Compensation Law, there is a statement to the effect that

> "Hospitals may render bills for board and room accommodations, medical and surgical supplies, and nursing facilities Voluntary hospitals may bill for x-ray services when rendered by an x-ray laboratory or bureau of such hospital duly licensed by the chairman Hospitals may bill for physiotherapeutic, anesthesia, and pathologic services when rendered by or under the supervision of salaried physicians on the staff The names and qualifications of all physicians and persons rendering services for which charges are made by hospitals must be included in all bills, and all medical and x-ray reports shall be promptly filed with the Workmen's Compensation Board and with the employer or its insurance carrier (as amended May 29, 1947)"

A similar rule is printed in the new medical fee scheduled On page 48, Rule 19, it is stated that the Workmen's Compensation Law was amended in May, 1947, to this effect The rule as published *is correct only in so far as it pertains to* voluntary hospitals and salaried roentgenologists employed by them where the hospital has obtained a license to conduct an x-ray laboratory We find no provision in Chapter 766 of the Laws of 1947 affecting pathology, anesthesiology, or physical therapy treatment in hospitals by salaried employes We have enquired of Mr Henry J Clay, general counsel to the Workmen's Compensation Board, for the authority for the inclusion of these specialties in the rules and regulations as published by the Workmen's Compensation Board Chapter 766 of the Laws of 1947 resulted from the passage of Assembly Int 2712 (Committee on Rules) and became effective immediately on passage in 1947 This was an amendment to Section 13-c 2 of the Workmen's Compensation Law and authorized voluntary hospitals to obtain an x-ray bureau license and to render bills for salaried employes for x-ray examination and treatment

Bureau Correspondence —The correspondence of this Bureau has been especially heavy during the summer months contrary to our usual experience, 276 communications were sent out

The Bureau of Bill Collections is growing, and physicians and county medical societies from all parts of the State are availing themselves of our facilities in ever increasing numbers

Report of Delegates to the American Medical Association House of Delegates —Dr Winslow presented the following report

The following gentlemen were in attendance at the 1948 Annual Meeting of the House of Delegates of the American Medical Association, representing the

[Continued on page 2526]


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Medical Society of the State of New York John J Masterson, J Stanley Kenney, Thomas A McGoldrick, Andrew A Eggston, Harry Aranow, Peter J Di Natale, George W Kosmak, Stephen R Monteith, Joseph P Henry, Scott Lord Smith, W P Anderton, Herbert H Bauckus, Albert F R Andresen, Thomas M Brennan, James R Reuling, Floyd S Winslow, Ralph T B Todd, O W H Mitchell, Edward P Flood, and Albert A Gartner

Also members of the House were Arthur J Bedell (Section on Ophthalmology), Roy B Henline (Section on Neurology), Chas Gordon Heyd (Past-President of the A M A.), Louis H Bauer (Trustee of the A M A), Edward R Cunniffe (Chairman of the Judicial Council), Herman Weiskotten (Chairman of the Council on Medical Education and Hospitals)

Attended some meetings Robert R Hannon (Executive Officer), Mr Dwight Anderson (Executive Secretary), Miss Doris K Dougherty (Administrative Assistant), Mr Thomas E Walsh (Field Representative), Mr Frederick W Miebach (Director, Information Service)

Your Delegates met on Sunday evening, June 20, 1948, at 7 05 P M in Room 810 of the Palmer House, Chicago, Illinois This room was provided for our meetings in accordance with your recommendation which was acted upon by the Board of Trustees

The resolutions assigned by the House of Delegates of the Medical Society of the State of New York for introduction at the American Medical Association were discussed and assigned

Of the five resolutions your delegates were instructed to present, the one regarding the unfairness of drafting physicians for the Armed Services of the United States was not presented because the legislation to which it referred had already been passed by the United States Congress, omitting such draft

A resolution regarding the requirement by some hospitals that a physician have certification from a National Specialty Board before he can be eligible for a senior staff appointment was introduced by Dr Edward P Flood This was referred to the Reference Committee on Miscellaneous Business, which recommended its consideration by the Subcommittee of the Board of Trustees on the Practice of Medicine This committee reported favorably regarding our resolution The intent of the resolution was adopted by the House as part of the Subcommittee's Progress Report

Your resolution urging the American Medical Association to have its employes insured for hospitalization through a nonprofit plan was introduced by Dr Stephen R Monteith It was referred to the Reference Committee on Medical Service and Prepaid Insurance Similar resolutions, and one contrary resolution, were introduced As a result of the Reference Committee report, the House of Delegates went on record that the A M A. should contract both Blue Cross and Blue Shield organizations, if possible, when these organizations have available policies in Chicago

A change in the Constitution of the American Medical Association to the effect that no component society should exclude any qualified physician from membership by reason of race, creed, or color was introduced It was referred to the Reference Committee on Scientific Assembly This Committee reported that the American Medical Association is a federation and that the decision regarding its membership lies entirely within the rights of each county medical society

Dr Harry Aranow introduced your resolution regarding hospital and medical care for veterans This was passed by the House after favorable report by the Reference Committee on Legislation and Public Relations

Dr Thomas A McGoldrick was chairman of the Reference Committee on Legislation and Public Relations Dr George W Kosmak was a member of the Reference Committee on Reports of Officers Dr W P Anderton was chairman of the Reference Committee on Reports of Board of Trustees and Secretary Dr Edward P Flood was a member of the Credentials Committee Dr Thomas M Brennan was a member of the Reference Committee on Miscellaneous Business Dr Scott Lord Smith was a teller Dr J Stanley Kenney was sergeant-at-arms

It gives me pleasure to report that our Society was ably and conscientiously represented by this delegation and particularly to report to you that Dr James R Reuling was elected vice-speaker of the House of Delegates of the American Medical Association

Illness

It was voted that the secretary send letters to Dr Harry Aranow and Dr Thomas M Brennan expressing the regret of the Council at their illnesses and hopes for improvement

Deaths—Dr Simpson reported that Dr Albert A. Gartner died September 9 and that his funeral would be Saturday, September 11, at 3 o'clock in the afternoon at Forest Lawn Cemetery, Buffalo The secretary was instructed to write a letter of condolence to the family

Session Appointments—The following appointments were made by the President and approved by the Council

History of Medicine Richard A Leonardo, Rochester, chairman, and George Rosen, New York City, vice-chairman, with the Secretary to be appointed later by the president He has not yet been selected

Physical Medicine George F Bock, Watertown, chairman, and Hans J Behrend, New York City, secretary

Special Appointments.

It was voted that Dr Frey again be appointed observer from the Council to the meetings of the Coordinating Council of the Five Greater New York County Medical Societies

It was voted that Dr Harry S Mustard, commissioner of Health of New York City, be appointed an advisory member of the Public Health and Education Committee

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A school teacher told her pupils to listen to their parents' conversation and if they heard any new words to look up the meaning in the dictionary and write a sentence using the word properly The next day she asked Johnny what word he had heard He replied that he had heard the word "pregnant" and the definition given in the dictionary was "To carry a child" The teacher asked, "Have you a sentence using it?"

"Yes, ma'am," he replied "The fireman climbed a ladder into the burning building and came down pregnant"—*Medical Briefs, September, 1948*

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REFERENCES:

1. J. Pediat. 32:1 (1948)
2. Am. J. M. Sc. 213 516 (1947)
3. J. Pediat. 32:110 (1948)
4. New England J. Med. 236 817 (1947)
5. New York State J. Med. 48:517 (1948)
6. Lancet 1:255 (1947).

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NECROLOGY

Charles E Baker, M.D, ninety, died on September 23 Dr Baker was graduated from the Eclectic Medical College of the City of New York in 1882 He began his practice in Marietta in 1884 and continued until his retirement in 1936

Frederic Huntington Bartlett, M D, died at his New York City home on October 9 at the age of seventy-six Dr Bartlett, who was originally a teacher, was graduated from the College of Physicians and Surgeons, Columbia University, in 1905 He served as a major in the Army Medical Corps during World War I Dr Bartlett was an attending physician at Babies Hospital and was at one time chief of pediatrics at Fifth Avenue Hospital He was well-known as the author of the text, *Infants and Children Their Feeding and Care*, published in 1932

Dr Bartlett was a member of the American Medical Association, the American Pediatric Society, the New York Academy of Medicine, and the New York State and County Medical Societies

Joseph F Cusick, M D, of Binghamton, died on October 13 He was forty-two years old Dr Cusick, a member of the board of governors of Georgetown University, Washington, D C, was graduated from the Georgetown University School of Medicine in 1931 A major in the Army Medical Corps during World War II, Dr Cusick was an associate surgeon on the staffs of City and Lourdes Hospitals, Binghamton, and the Charles S Wilson Memorial Hospital, Johnson City Dr Cusick was a member of the American Medical Association and the New York State and Broome County Medical Societies

Julius Hammer, M D, seventy-four, of New York City, died on October 17 Dr Hammer, a general practitioner, was graduated from the College of Physicians and Surgeons, Columbia University, in 1902, and served his internship at Manhattan General and Sloane Maternity Hospitals Dr Hammer, who had retired before World War II, returned to active practice during the war and then retired again after the war He was a member of the American Medical Association and the New York State and County Medical Societies

Samuel H Korman, M D, of Brooklyn, died September 16 at the age of thirty-seven Dr Korman was graduated from the Eclectic Medical College, Cincinnati, in 1936 He was a psychiatrist who served as alienist at Kings County Hospital As supervising psychiatrist of Brooklyn State Hospital, Dr Korman developed special treatments in shock therapy for difficult mental cases and also assisted the Veterans Administration in this work He was a diplomate of the American Board of Psychiatry and Neurology and a member of the American Medical Association and the New York State and Kings County Medical Societies

George Lenz, M D, died on October 18 He was seventy-three years old Dr Lenz had practiced medicine in Gloversville ever since his graduation from Albany Medical College in 1900 Formerly chief of staff of the Nathan Littauer Hospital, Gloversville, he also served as consultant surgeon on the staff of this hospital Dr Lenz was a member of the American Medical Association and the New York State and Fulton County Medical Societies He was also a Fellow of the American College of Surgeons

Max Lehman, M D, of Queens, died on October 16 at the age of sixty-eight Dr Lehman was graduated from Cornell University Medical College in 1907 He was on the staff of Bushwick Hospital, Brooklyn, and was associated with the Prudential Insurance Company of America for more than forty years as examining physician A charter member of the Queens County Medical Society, Dr Lehman also belonged to the American Medical Association and the New York State Medical Society

William Little, M D, a general practitioner in Chenango County for fifty-four years, died at his home in Sherburne on October 19 at the age of eighty-two Dr Little, who had retired three years ago because of illness, was graduated from New York Homeopathic Medical College in 1891 He was village health officer for forty-three years in Sherburne Dr Little was honored for his fifty years of service in the medical profession by the Medical Society of the State of New York in 1944 He was also a member of the American Medical Association and the Chenango County Medical Society

Henry Brown Turner, M D, of New York, died on October 5 Dr Turner was forty-nine years old He was graduated from Johns Hopkins University School of Medicine in 1926 He was an assistant attending physician at New York Post-Graduate Hospital, an associate physician in the out-patient department of that hospital, and he also served as cardiologist for several insurance companies in New York City Dr Turner studied cardiology in London and Paris and had served on the staff of the American Hospital in Paris

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MARRIAGE, DIVORCE DECREASED IN 1947

The divorce rate decreased sharply in 1947, the United States Public Health Service reported recently The marriage rate also was lower last year, it said The report was based on a preliminary census compiled by the service's vital statistics office

The divorce and marriage rates were lower only in comparison to the all-time highs set in 1946 Both remained well above prewar levels The number of divorces in 1947 was estimated at 471,000, compared to 610,000 in 1946

The divorce rate for 1,000 population was 3 3 last year, a decline of about 25 per cent from the 4 3 rate of 1946

The federal agency reported 1,992,354 marriages in 1947, compared to 2,291,045 in 1946 The marriage rate for 1,000 population was 13 9 in 1947, compared to 16 4 in 1946 The marriage rate was the second highest in history, being exceeded only by 1946 The divorce rate was the third highest, exceeded by both 1946 and 1945

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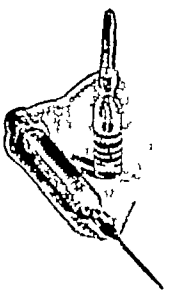
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MEDICAL NEWS

Seven Win Lasker Awards for Medical Work

THREE scientists and four public health administrators are recipients of the 1948 Lasker Awards for outstanding contributions to medicine, according to an announcement by Dr George Baehr, chairman of the committee of the American Public Health Association that selected the recipients Formal presentation of the awards was made at the dinner in Boston on November 11, with each individual award consisting of $1,000 and a gold statue

Scientific awards were given to Dr Selman A Waksman of Rutgers University, Dr Rene J Dubos of the Rockefeller Institute, and Dr Vincent du Vigneaud of Cornell University Medical College

Awards for administrative achievement went to Dr Martha M Eliot of the U S Children's Bureau, Washington, D C, and Dr Rolla E Dyer of the National Institute of Health, Bethesda, Maryland

The department of medicine and surgery of the Veterans Administration received the Lasker Group Award, with particular honor to Dr Paul R Hawley, former medical director, and Dr Paul B Magnuson, present medical director

Dr du Vigneaud was cited for his contribution to the chemistry of the vitamins and nutrition, and for leading a research team that first produced a synthetic penicillin

Annual Christmas Seal Sale Starts

THE annual sale of Christmas Seals, sole support of the National Tuberculosis Association and its 3,000 affiliates throughout the country, will begin on November 22 and end on Christmas Proceeds from this, the 42nd annual sale, will be used in the year-round fight against tuberculosis through education, case-finding, rehabilitation, and medical research Of the money raised each year through the sale of Christmas seals, 95 per cent is used within the state of origin, and five per cent is allocated to the National Association The specific program in each community depends on needs and resources

Set National Diabetes Week December 6 to 12

THE American Diabetes Association is launching a nation-wide drive of diabetes detection, with Dr Howard Root of Boston, Massachusetts, as chairman of the committee appointed to carry on this work The inauguration of a year-round Diabetes Detection Drive will be National Diabetes Week, to be held from December 6 to 12, 1948

As a first step in a full-scale attack on diabetes, eighth among the leading causes of death, the committee suggests that each county medical society appoint a committee on diabetes The National Committee on Diabetes Detection has programs available for medical meetings, radio broadcasts and spot radio announcements for use by both city and county medical societies, and suggestions for cooperation with local hospitals toward the control of diabetes, Dr Root announced

State Mental Hygiene Department Opens Food Service Training School

TWENTY-FOUR head cooks from the institutions of the New York State Department of Mental Hygiene enrolled October 11 for the opening session of the department's new Food Service Training School located at Hudson River State Hospital in Poughkeepsie, Commissioner Frederick MacCurdy announced The school, which includes a fully equipped food service laboratory, has been set up on a permanent basis for instruction of institution employes in food preparation and service

New England Journal Announces Prize Essay Contest

IN ACKNOWLEDGMENT of the support of more than 4,000 student subscribers, the *New England Journal of Medicine* has announced a prize essay contest open to all members of the class of 1949 registered in any medical school approved by the Council on Medical Education and Hospitals of the American Medical Association

The subject chosen for this year's competition is "Recent Advances in Preventive Medicine"

Manuscripts are to be between four and five thousand words in length, clearly typewritten in English, double or triple spaced with references listed at the end in numerical arrangement according to the form used by the *Quarterly Cumulative Index Medicus* They must be in the hands of the editor by March 15, 1949 All manuscripts will become the property of the *Journal*

A cash prize of $100 will be paid for the best essay of those found to be suitable for consideration, the paper will be published in the "Medical Progress" series that forms a regular part of the contents of the *Journal*, and the author will receive a hundred free reprints

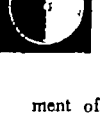
A second prize will consist of a two-year subscription to the *Journal*

The editors wish to emphasize that in establishing this competition they are as much interested in encouraging good medical writing as they are in promoting the collection of scientific material In judging papers that may be submitted, particular attention will accordingly be paid to clarity, simplicity, and general literary excellence

[Continued on page 2532]

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[Continued from page 2530]

Trudeau Memorial Held at Saranac

THE founder of the first tuberculosis sanatorium in the United States was eulogized by doctors who gathered at Saranac Lake on October 5 to celebrate the 100th anniversary of his birth

Memorial wreaths were placed at the statue of Dr Edward Livingston Trudeau on the grounds of the sanatorium that bears his name Dr David R Lyman, director of the Gaylord Farm Sanatorium at Wallingford, Connecticut, paid tribute to Dr Trudeau on behalf of the past and present Trudeau patients, who number 8,000 throughout the world

Among the speakers were Dr Miguel C Lascalea, of Buenos Aires, Dr M J Rojana, of India, and Dr Kung Chin Pao, of China Dr Ezra Bridge, director of Iola Monroe County Sanatorium, Rochester, said the cottage sanatorium Dr Trudeau founded in 1884 had grown to be the largest of its kind in the country

Women's Death Rate from Cancer Declines

THE death rate from cancer among women in 1947 continued a fifteen-year decline, statisticians of the Metropolitan Life Insurance Company revealed recently The trend was viewed as due largely to the nation-wide anticancer campaign which has helped to make women more alert to early danger signals of the disease

Among the company's white female industrial policyholders the age-adjusted death rate has decreased from 93 5 for each 100,000 in 1932–1934 to 82 9 in 1947, a reduction of 11 per cent The company stated, however, that in spite of the gains which have been made, 100,000 women in the United States are expected to die of cancer and other malignant tumors in 1948, and this death toll, second only to that from heart disease, is expected to rise as the number of older women in the population increases

MEETINGS

FUTURE

Moreno Clinic and Psychodramatic Institute

The third and fourth national conferences, sponsored by the Moreno Clinic and the Psychodramatic Institute, will be held November 27 and 28 and December 26, 27, and 28 at Beacon, New York The conferences will cover psychodrama, sociodrama, sociometry, and group psychotherapy, and the theme will be "Training in Human Relations"

Further information may be obtained by writing to the Moreno Clinic, Beacon, New York

American Medical Association, Interim Session

The Interim Session of the American Medical Association will open in St Louis, Missouri, on November 30 and continue through December 3 All activities, including meetings of the House of Delegates, general lectures, clinical presentations, scientific exhibits, technical exhibits, motion pictures, and television, will be concentrated in the Kiel Auditorium in St Louis

The program includes a general session on Tuesday and Thursday evenings, with entertainment on Wednesday evening The second annual General Practitioner award will be presented on Thursday evening

Institute of Industrial Medicine

The Commerce and Industry Association of New York, in cooperation with the Institute of Industrial Medicine, New York University-Bellevue Medical Center, will sponsor a symposium on December 1 on industrial health problems for New York businessmen The conference has the endorsement of the New York County Medical Society, the American Medical Association, and other medical organizations

American Federation for Clinical Research, Eastern Section

The Eastern Section of the American Federation for Clinical Research will hold its annual meeting in Philadelphia, Pennsylvania, on December 4, at the Temple University School of Medicine

Further details may be obtained from Dr J Edward Berk, 255 South 17th Street, Philadelphia 3, who is secretary of the Eastern Section

American Urological Association, Northeastern Section

The American Urological Association through the Northeastern Section will conduct an intensive postgraduate course in urology lasting one week, from January 3 through January 8, 1949, under the auspices of the School of Medicine, University of Buffalo

The whole subject of urology, including the basic sciences, anatomy, physiology, bacteriology, biochemistry, and pathology of the urinary tract, will be covered Clinics will be held during the week.

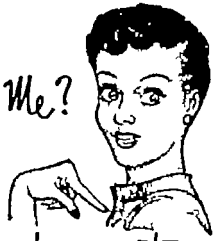
For further information and application, write to Dr George E Slotkin, chairman, Medical Center Building, 333 Linwood Avenue, Buffalo 9, New York.

PERSONALITIES

Honored

Dr James C Harberson, Watertown, who was elected an associate fellow of the American Proctologic Society Dr Homer W Smith, chairman of the department of physiology, New York University College of Medicine, who received the Medal for Merit, the President's highest award to civilians, "for exceptional meritorious conduct in the perfor-

[Continued on page 2536]



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HOSPITAL NEWS

Safety Methods for Hospital Personnel

INAUGURATION of a special course in Safety for Hospital Personnel in cooperation with the New York University Center for Safety Education, New York City, was announced recently by Louis Schenkweiler, president of the Greater New York Hospital Association, representing 97 voluntary nonprofit and 22 municipal hospitals in the metropolitan area

Dr Walter Cutter, assistant professor of industrial safety, New York University, and consultant to the Secretary of the Army on training in accident prevention, urged hospital authorities to continue their efforts to reduce accidents among their personnel Dr Karl Klicka, a member of the American Hospital Association's Council on Safety, commended the local Association for its cooperation with the national campaign of the National Safety Council and American Hospital Association for increased safety in hospitals

Hospital Council Names Five

NORMAN S GOETZ, president of the Hospital Council of Greater New York, announced recently the election of five new members to the council's board of directors for three-year terms The new members are James W Husted, Dr Howard A Rusk, Miss Winifred Fisher, Nathan S Sachs, and T J Ross Members re-elected for three-year terms were

Arthur A Ballantine, Dr Jean A Curran, Dr Haven Emerson, Dr Morris Hinenburg, and Raymond P Sloan Dr John B Pastore is executive director of the Hospital Council

Columbia Announces Course in Bronchopulmonary Diseases

COLUMBIA University, College of Physicians and Surgeons, announces a course in "Physiologic Therapy in Bronchopulmonary Diseases" to be given Monday through Friday, January 24 to 29, 1949, by Drs A. L Barach, H A. Bickerman, and C Eastlake

The course will deal with the principles of physiologic and antibiotic therapy of bronchial asthma, pulmonary emphysema and fibrosis, chronic bronchitis and bronchiectasis, and pulmonary tuberculosis The application of technics will be demonstrated on cases receiving inhalational, aerosol, and immobilizing lung chamber therapy This part of the program is available for veterans

For further information, apply to Dr John B Truslow, assistant dean, Columbia University, College of Physicians and Surgeons, 630 West 168th Street, New York City

Cancer Study Clinic Planned at Sydenham

SYDENHAM Hospital, New York City, has completed preparations for a project in clinical cancer research, Dr Jacob Heiman, chief of the medical service and chairman of the medical board, announced recently

The project has two objectives, Dr Heiman announced It is aimed at an understanding and possible prevention of certain types of tumors commonly associated with internal gland, or endocrine, secretions, and at an understanding of "what may be going on in the patient which may produce a tumor recurrence," in the hope that if this can be determined recurrent tumors may be prevented While the study is in progress and following each tumor operation, patients will be referred to the hospital's tumor clinic to be placed under surveillance

NEWS NOTES

Formal opening of the new $1,500,000 wing of St Peter's Hospital, Albany, will take place November 21, Sister Mary Esther, hospital administrator, has announced The new wing will increase to 300 the capacity of the hospital, which at present has 159 beds

The first step toward actual construction of the Community Memorial Building, the $1,500,000 addition to the Lawrence Hospital, Bronxville, will begin this fall, it has been announced Altering the course of the Bronx River at the rear of the site will be the first move toward the erection of the new structure, which is to be completed by December, 1950

Emergency medical care for Geneva citizens on Wednesday afternoons, Sundays, and legal holidays will be provided, according to a resolution adopted recently by the staff of the Geneva General Hospital and announced by Dr George H R White, president of the staff, and Dr Kenneth Ward, chairman of the committee arranging the service

According to the plan, one member of the staff will be on call on each of the designated days from noon to 11 P M Persons unable to obtain the services of their regular physician at the specified times may call the hospital and obtain the name of the physician on call

[Continued on page 2536]



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[Continued from page 2534]

The revised plans for Massena's new 87-bed hospital, to cost not more than $750,000, were approved by the town board at its September meeting The building will provide for 87 beds, including 12 beds for children, and 26 bassinets There will be 31 private rooms and three rooms for isolation cases

Brooklyn's fifth cancer prevention and detection clinic has opened at the Jewish Hospital of Brooklyn, it has been announced by Dr S Potter Bartley, chairman of the Brooklyn Cancer Committee

Following a questionnaire survey of public opinion by the board of managers of the Hospital at Sidney, it was indicated that 96 per cent of those replying believed that the Hospital should be enlarged, and 94 per cent favored raising funds for the expansion through a subscription campaign

Owned and operated by the town of Sidney, the Hospital has 30 beds Present plans call for construction of a new wing containing 20 additional beds and improved office and admitting space, together with some reconstruction in the existing building The goal of the fund was oversubscribed in the campaign

• •

Additional departmentalization of the Troy Hospital staff with the appointment of three doctors has been announced They are Dr James W Fitzgerald in proctology, Dr John J Keenan in gynecology, and Dr Alfred T Purificato in orthopedic surgery

Three vacancies in the department of medicine have been filled by the promotions to attending of Dr Henry F Albrecht, Jr, Dr James V Barrett, and Dr Daniel P Mahoney

• •

Under the sponsorship of Mount Sinai Hospital New York City, two lectures were given recently by Dr Bernard N Halpern of Paris, France On October 7, Dr Halpern spoke on "The Role of the Capillary Permeability in the Production of Acute Pulmonary Edema and the Action of the Synthetic Antihistaminic Substances in This Syndrome," and on October 14, on "Experimental and Clinical Researches on a New Series of Antihistaminic Substances Derived from Phenothiozone"

•

Dr Curtis T Prout, formerly in charge of the men's department at the New York Hospital-Westchester Division, has been appointed assistant medical and clinical director, and Dr Donald M Hamilton, senior assistant psychiatrist, has succeeded Dr Prout as physician in charge of the men's department, according to an announcement by Dr James H Wall, medical director

Medical News

[Continued from page 2532]

mance of outstanding services to the United States as a member of the National Defense Research Committee"

Elected

Dr Frederic E Elliott, Brooklyn, director of medical services for United Medical Service, New York, as vice-president of the organization

Appointed

Dr Thomas D Dublin, former professor of preventive medicine and community health at the Long Island College of Medicine, Brooklyn, as executive director of the National Health Council Dr Halley H Friederwitzer, New York City, as research medical director of Modern Medical Products, New York City Dr Luther B MacKenzie, New York City, as chairman of the general solicitation committee of the New York University-Bellevue Medical Center Fund Dr Carl R. Wise as University medical officer at Columbia University, succeeding Dr William H McCastline, who retired in June

Speakers

Dr George T Pack, New York City, on "Cancer of the Gastrointestinal Tract" at the meeting of the Somerset County Medical Society, Far Hills, New Jersey, on October 8 Dr M A. Pattison, director of Potts Memorial Institute, Livingston, a group of lectures on "Rehabilitation of the Tuberculous" at Mexico City the first week of November, at the invitation of the Sociedad Mexicana de Estudios sobre Tuberculosis

New Offices

Dr Henry Kaine, Roslyn, general practice in Spencer Dr Arthur D Smith, general practice in Elmira Dr Edson L Stannard, general practice in Port Washington Dr Richard Woodruff, formerly of the Sunmount Veterans Hospital staff, Tupper Lake, practice of general and thoracic surgery in Schenectady



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WOMAN'S AUXILIARY

TO THE MEDICAL SOCIETY OF THE STATE OF NEW YORK

Executive Board Holds Fall Meeting

THE fall board meeting of the Woman's Auxiliary was held October 18 and 19 in Syracuse, with Mrs Edgar M Neptune, State president, presiding, and officers, committee chairmen, county presidents and presidents-elect attending

Reports of officers and chairmen were presented in a bound theme book, "Ladder to Auxiliary Success," showing the varied activities of the county auxiliaries and State committees Emphasis for 1948 and 1949 is on an "alert, informed, active membership"

On October 18, Dr Leo F Simpson, president of the Medical Society of the State of New York, and Dr Norman S Moore, chairman of the nutrition committee of the American Medical Association, spoke at a dinner for the group Dr Simpson pointed out that one aim of the State Society should be to get people to realize the importance of the medical care programs now being offered, and suggested that the Society and the Auxiliary use their connections with civic, social, and other organizations to help the medical profession determine what the public wants in terms of health care He paid tribute to the Auxiliary for its work. Dr Moore discussed nurse recruitment, explaining that the Auxiliary might aid in coordinating the various members of the medical family—the hospital, the doctor, and the nurse—into one group

At a luncheon on October 19, Dr Clealand R Sargent, Syracuse City Health Commissioner, spoke on public health, giving a brief survey of public health problems and detailing the attitude of the public health department on socialized medicine

During the business sessions, reports of county presidents were heard, and a general discussion of county auxiliary problems held Approximately 100 members of the State Auxiliary attended the sessions

COUNTY NEWS

Albany County

Voting to establish a nurses' scholarship fund, the Woman's Auxiliary to the Albany County Medical Society held a benefit card party and food sale on October 27, with the proceeds to be used for the fund The scholarship will be available to a high school graduate from Albany County A feature of the party was a style show with Auxiliary members serving as models

On Wednesday, November 17, the group will hold a membership tea to welcome new members of the Auxiliary

Broome County

The Broome County Woman's Auxiliary opened its fall season with a luncheon at the Binghamton Club, Binghamton, making plans to assist at the Sixth District Branch meeting on October 6 Auxiliary guests at the District Branch meeting visited the International Business Machines building for an afternoon program and tea.

The Auxiliary also assisted at the annual Broome County health fair and worked to secure donors for the Red Cross blood bank

Chautauqua County

On September 23 the Chautauqua County Woman's Auxiliary met for a luncheon meeting at the Cassadaga Valley Country Club, with 25 members present and Mrs Calvin Clark Torrance, president, in charge of the business meeting Reports by the officers and committee chairmen were made

Guest speaker at the meeting was Miss Catharine Locke, of the business staff of the Brook's Memorial Hospital, Dunkirk, who gave a review of the book, *Hongkong Holiday*, by Emily Hahn Miss Locke was introduced by Mrs Benjamin Custer, Fredonia.

Columbia County

Dr J L Edwards spoke on the Wagner-Murray-Dingell Bill at the meeting of the Columbia County Auxiliary held September 28 in Hudson Mrs H J Noerling presided at the luncheon meeting

Erie County

Recent activities of the Erie County Woman's Auxiliary have included a business meeting on September 28, a benefit dessert bridge in October, assisting at the first International Congress of Hematology, sponsored by the University of Buffalo, and distribution of posters for public health night, held September 22 in Buffalo In addition, several members of the Auxiliary attended the fall board meeting in Syracuse on October 18 and 19

The membership and hospitality committees are planning a Christmas tea to welcome and honor new and prospective members.

Genesee County

Members of the Genesee County Auxiliary were hostesses to the auxiliaries from six counties in the Eighth District Branch at the annual branch meeting on September 16 in Batavia Guests were entertained at a theater party and tea, and discussions on projects for county auxiliaries were held Mrs Charles Mann, president of the Genesee County Auxiliary, Mrs Raymond Warn, treasurer, and Mrs Sidney McLouth, secretary, were in charge of arrangements

Madison County

The Madison County Woman's Auxiliary opened its fall and winter season with a tea at the home of the president, Mrs Eugene W Carpenter, Oneida, on October 12, with wives of all physicians in the county invited

The committee in charge of arrangements included Mrs Charles A. Earl, Mrs Edmund L Finley, and Mrs J Frederick Rommel, Jr Mrs

[Continued on page 2540]

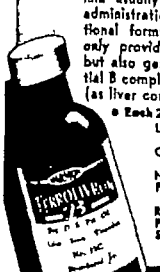
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[Continued from page 2548]

Robert L Crockett and Mrs Otto Pfaff presided at the tea table

Monroe County

Four meetings have been planned for the year by the Monroe County Woman's Auxiliary, with the first on September 15 having been a benefit style show at the Seneca Hotel, Rochester On Friday, November 12, Mr Thomas E Walsh, field representative of the Public Relations Bureau of the State Society, spoke on "Chiropractic and other Legislative Matters"

A panel discussion on "What Every Doctor's Wife Should Know" will feature the meeting on February 11, 1949, and the annual luncheon and election of officers will be held on April 8, 1949 Yvelin Gardner, assistant to the executive director of the National Committee for Education on Alcoholism, will be the guest speaker

Nassau County

During September, members of the Nassau County Woman's Auxiliary worked with the county society at the Mineola Fair The cancer committee sponsored the "Talking Mirror" and the medical society, a scientific booth, both being staffed by Auxiliary members

A membership tea was held on September 30 at the Nassau County Hospital auditorium, with 80 attending Mrs John L Neubert, Auxiliary president, welcomed the guests, and Mrs Nathaniel Robbins, Hempstead, and Mrs E Freeman Miller, Freeport, past presidents, presided at the tea table

Oneida County

The Oneida County Woman's Auxiliary held its first fall luncheon meeting October 12 at Dibble's Inn, Vernon Mrs Edgar M Neptune, Syracuse, State Auxiliary president, and Mrs Neil Paul, Syracuse, vice-president of the Onondaga County Auxiliary, addressed the group

Reporting on the nurses' scholarship program, Mrs G L Higgins announced that five scholarships were awarded this year and that funds are available for another Plans were made to continue the program and to raise funds so that the number of scholarships awarded may be increased

Orange County

The regular monthly meeting of the Orange County Auxiliary on October 12 was in the form of a membership tea, with Mrs Harry F Pohlmann as hostess and 34 members and prospective members present Plans were completed to make a donation to the Physicians' Home and to set up a recruitment committee for student nurses

The Auxiliary participated in the meeting of the First District Branch at Newburgh on October 26 by acting as hostesses to the auxiliary members present from other counties, and by handling the registration of physicians at the meeting

Queens County

Activities for the Queens County Auxiliary have included a meeting on October 26, with Mrs Clifton L Dance, Second District Branch Counselor, as guest speaker, a reception on October 24 to honor Mrs William LaVelle, who has been chosen president-elect for the State Auxiliary, and participation in activities of the branch and State meetings

On November 13, a benefit dinner dance was held at the North Hills Country Club, with the proceeds to be used to purchase equipment for ill children in the various Queens' institutions

Saratoga County

Members of the Saratoga County Woman's Auxiliary met on October 5 at the Nurses Lounge at the Saratoga Hospital. Mrs Thomas E Bullard, Schuylerville, past-president, spoke on "Our Colored Brethren"

At a recent executive board meeting, at which Mrs Bullard was hostess, plans were made for a rummage sale and a silver tea, both funds to be used for aid to a student nurse or medical student

At the Saratoga County Fair in August, the group maintained a booth where literature on social medicine, rheumatic fever, cancer, and the Spa development was distributed Mrs M E. Van Aernam was in charge of the booth

Schenectady County

Plans for the year were made at the first executive board meeting of the Schenectady County Woman's Auxiliary, held September 22 at the home of Mrs Gomer Richards, Schenectady, president of the group

Activities discussed included regular programs for the year, distribution of a questionnaire to determine interests of the members, a study of a possible nurse scholarship program, and a project to acquaint new members with the history of the group

Suffolk County

The Suffolk County Woman's Auxiliary awarded three nurses scholarships to girls who entered training in September In order to raise funds to continue this project, the second annual Nursing Scholarship dance was held by the Auxiliary at the Patchogue Hotel on October 16

At the regular meeting on October 27, an educational motion picture on heart disease, entitled "Act Your Age," was shown

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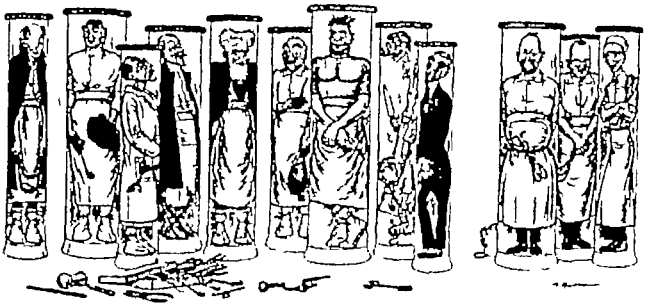
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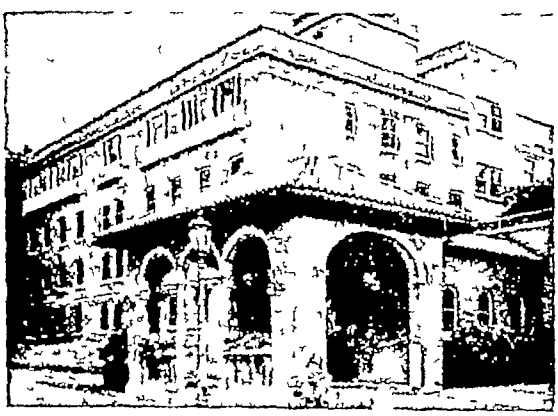
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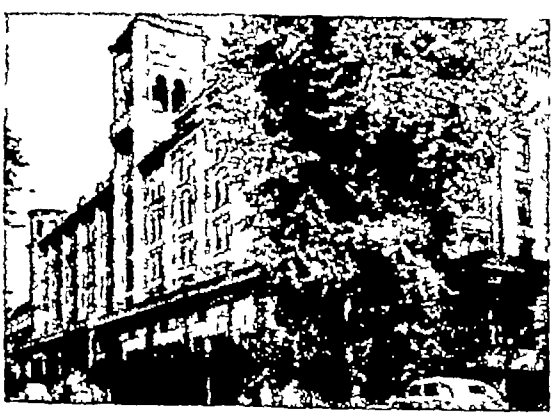
CONTENTS

SCIENTIFIC ARTICLES

Complete Prolapse Following Hysterectomy, *Mortimer N Hyams, M D, F A C S* 2581
Misuse of Insulin in the Diabetic Syndrome, *Herbert Schreier, M D*, and *Elmer L Sevringhaus, M D* 2587
Spinal Analgesia and Anesthesia in Obstetrics, *H Arthur Snell, M D* 2590
Habitual Abortion, *Carl T Javert, M D* 2595
Topical Anesthesia, *Frank C Combes, M D*, and *Rose B Saperstein* 2599
The Management of the Problems Associated with Prolonged Labor, *Duncan E Reid, M D* 2601
The Present Status of Preservation of the Anal Sphincter in Radical Operations for Carcinoma of the Rectum and Rectosigmoid, *A O Wilensky, M D* 2605
A New Method in the Management of Acute Anterior Poliomyelitis, *Emil Smith, M D, David J Graubard, M D, Norman Goldstein, M D*, and *William Bikoff, M D* 2608
Diethylstilbestrol in the Treatment of Idiopathic Repeated Abortion, *Bernard Lapan, M D* 2612

(Continued on page 2548)





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(CONTENTS—Continued from page 2546)

Inulin Clearance in the Altered Endocrine State, *Jonas Weissberg, M D*, and *Thomas H McGavack, M D* 2615
Sodium Morrhuate with Sodium Sulfadiazine in the Treatment of Varicose Veins, *Harvey L Myers, M D* 2619
Hodgkin's Disease Involving the Nose, *Herbert L Cahn, M D* 2622

CASE REPORTS

Strangulated Hernia Reduced En Masse, *Charles M Graney, M D*, and *Merlin A Bissell, M D* 2625
Fatal Hypoglycemia, *Joseph Cook Watts, M D* 2627
Carcinoma of the Head of the Pancreas Simulating Spinal Cord Tumor with Multiple Venous Thromboses, *William B Rawls, M D*, and *V Charles Ancona, M D* 2629

EDITORIALS

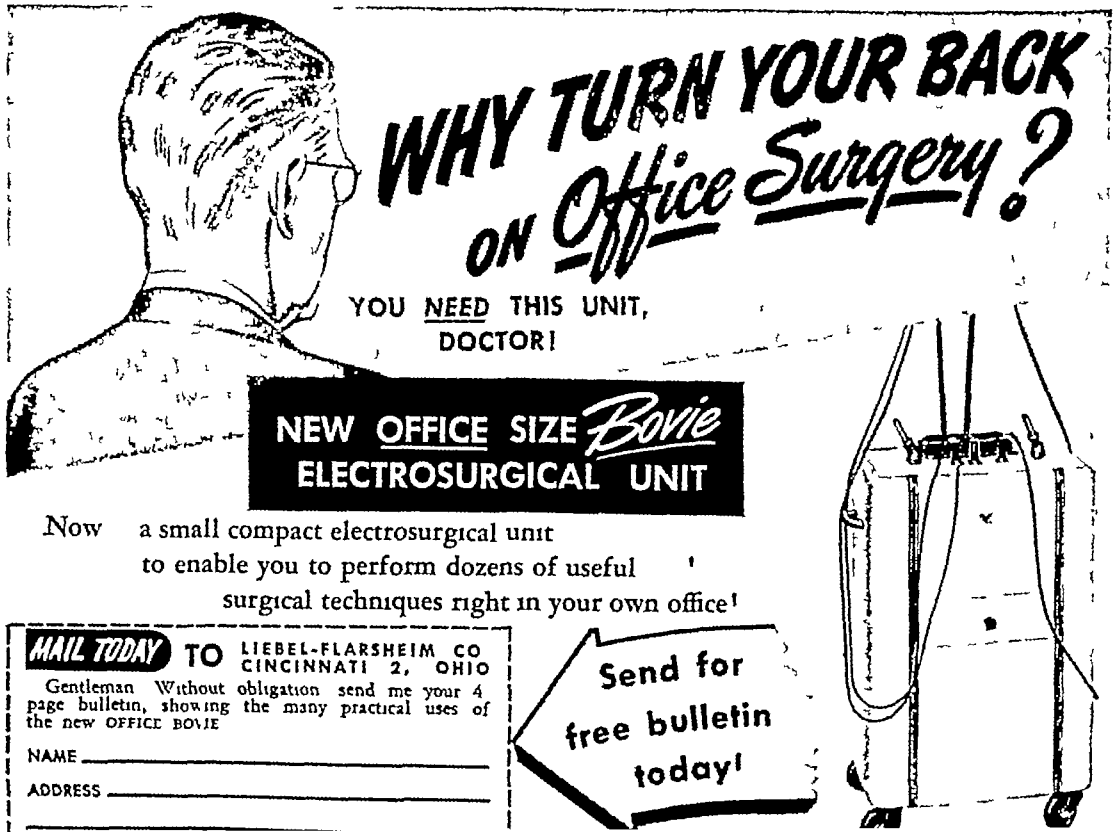
Stop, Look, Listen, I 2575
Current Editorial Comment 2577
Facts About Nutrition 2579

GENERAL FEATURES

Necrology 2632
Medical News 2634
Hospital News 2638
Books 2644

MISCELLANEOUS

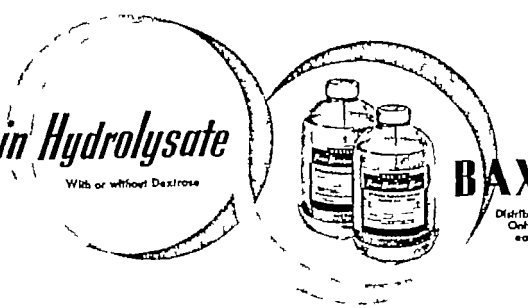
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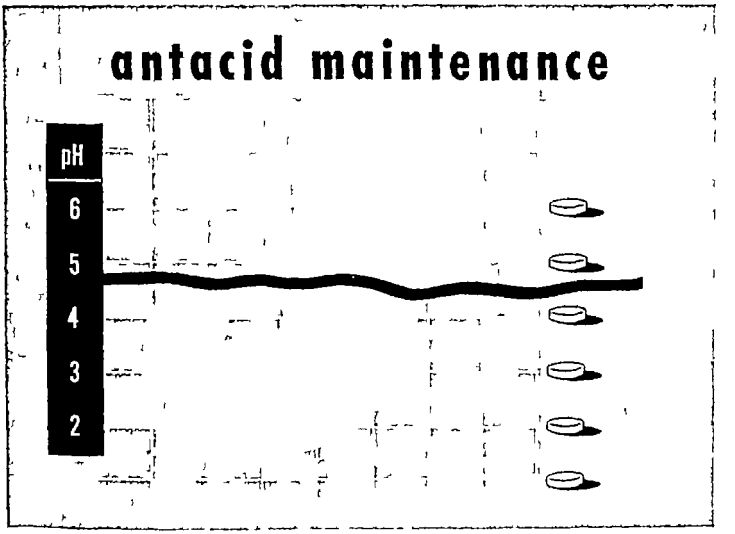
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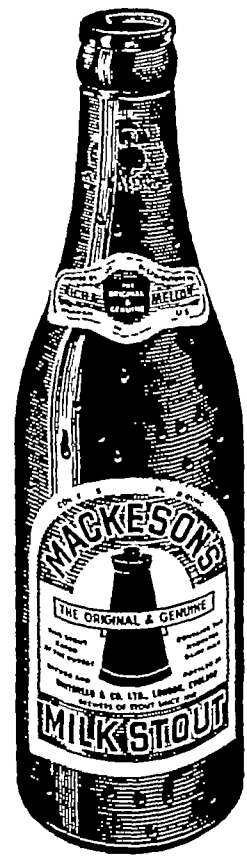
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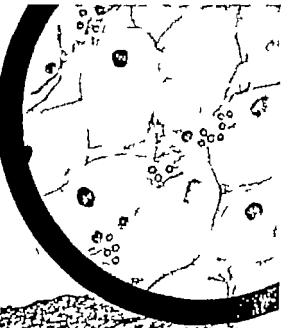
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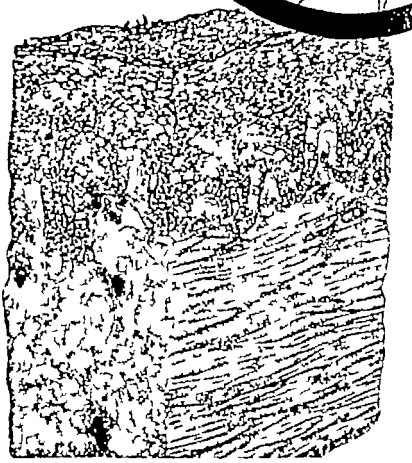
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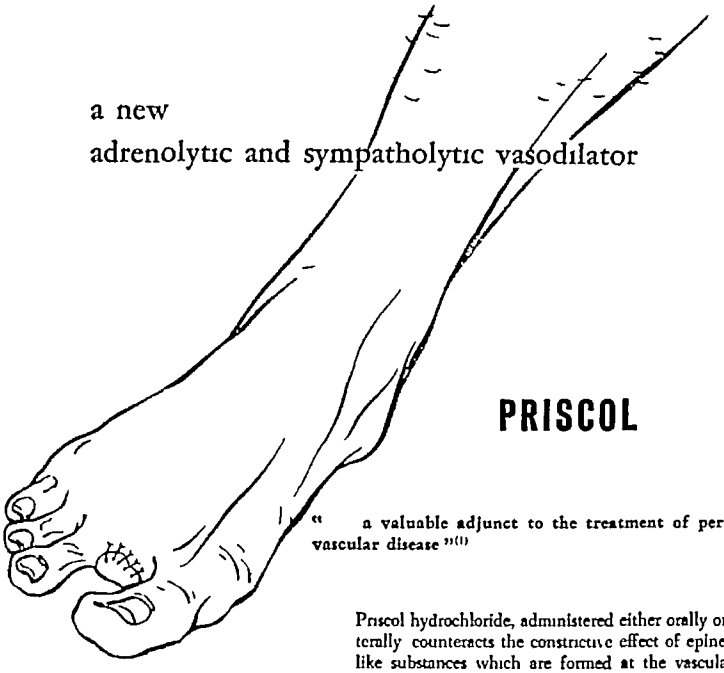
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1 Grimson, K. S., Marconi, P. A., Reardon M. J and Hendrix J P.: Surg. 23 728 1948.

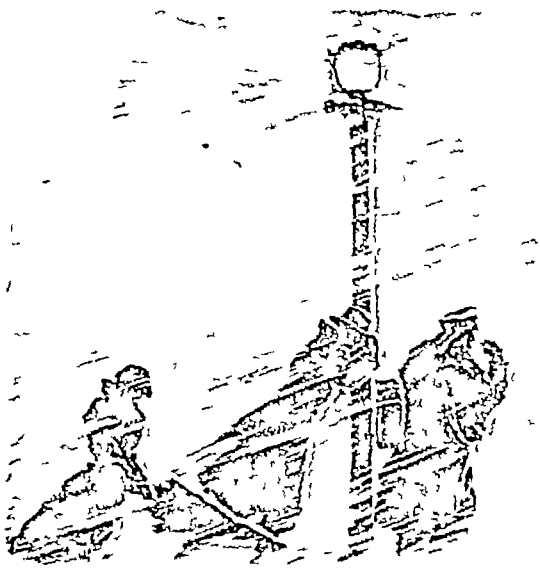
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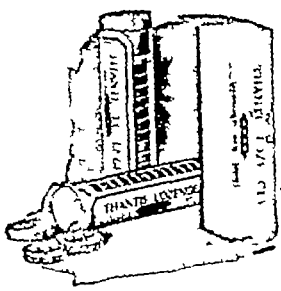
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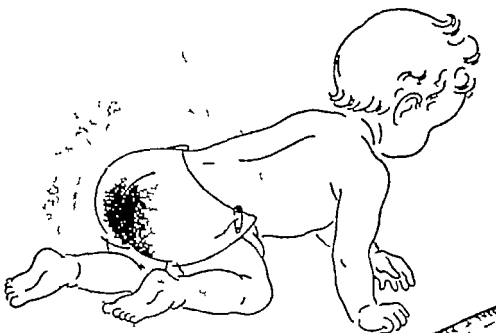
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INDEX TO ADVERTISERS

Abbott Laboratories	254
American Hospital Supply Corporation	25
American Pharmaceutical Company	26
The Arlington Chemical Company	25
A C Barnes Company	25
Dr Barnes Sanitarium	26
Milton H Berry Foundation Schools	26
Bilhuber-Knoll Corp	25
Brigham Hall Hospital	26
Bristol Laboratories Inc	26
Brown s Medical Bureau	26
Brunswick Home	26
Camilla Lucas Gallery	25
Carservice Inc	25
Ciba Pharmaceutical Products Inc	2nd cover 25
Clifton Springs Sanitarium	25
Commercial Solvents Corporation	25
Conti Products Corp	26
Davies Rose & Company Limited	25
Doak Co , Inc	25
H E Dubin Laboratories, Inc	25
Eaton Laboratories, Inc	26
Falkirk in the Ramapos	26
Greenmont on Hudson	26
Halcyon Rest	26
Hall Brooke	26
Hoffmann La Roche Inc	25
Holbrook Manor	26
Homemaker s Products Corporation	25
Hynson Westcott & Dunning Inc	2558, 26
Interpines	26
Lanteen Medical Laboratories Inc	25
Liebel-Flarsheim Co	25
Eli Lilly and Company	Between 2574-25
Louden Knickerbocker Hall, Inc	26
Mandl School	26
The Maples Inc	26
Mead Johnson & Co	4th cov
National Discount & Audit Co	26
New York Polyclinic Medical School and Hospital	25
Pediforme Shoe Co	25
Pinewood	26
R. J Reynolds Tobacco Co	25
J B Roerig and Company	25
Schenley Laboratories Inc	26
Schering Corporation	25
G D Searle & Co	25
Sharp & Dohme	25
Smith, Kline & French Laboratories	2544 2560 2567 2652 26
Spencer Incorporated	26
Standard Pharmaceutical Co Inc	25
Swift & Company	25
Marvin R Thompson Inc	26
Charles B Towns Hospital	26
Justin Traub	26
Upjohn Company	25
U S Vitamin Corporation	25
Wallace Laboratories Inc.	3rd cov
William R. Warner & Co Inc	25
West Hill	26
Whitbread & Co Ltd	25
White Laboratories Inc	Between 2558-25
Winthrop-Stearns Inc	25
Wyeth Incorporated	26

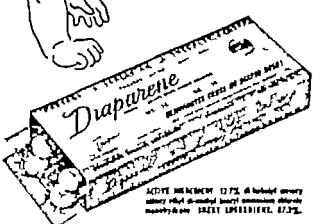
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1. Cook, J F Brennemans Practice of Ped. 4: Chap. 47 1945.
2. Stetson, R.A. et al. J. Ped. 31 749-754, 1947
3. Parkman, H.M.: Skin & Cancer Clinic, Post Graduate Hospital, New York, 1948.

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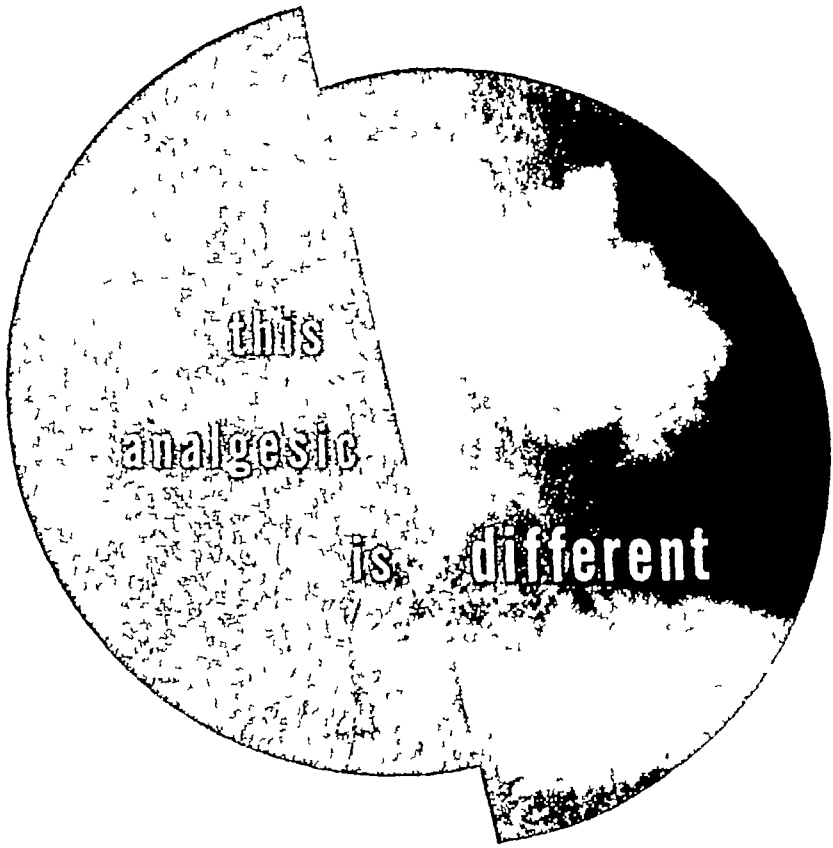
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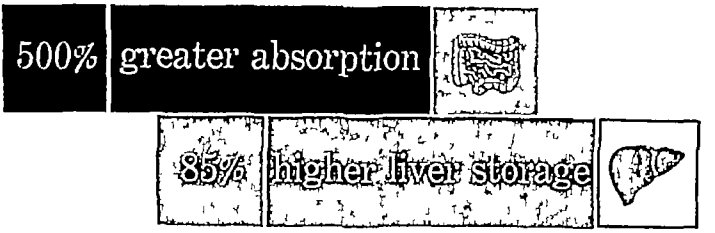
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INDEX TO ADVERTISED PRODUCTS

Aluminum Penicillin Tablets (Hynson, Westcott & Dunning, Inc) 2647
Aminophyllin (H E Dubin Laboratories, Inc) 2568
Bacitracin (Commercial Solvents Corporation) 2569
Belexon (American Pharmaceutical Company) 2635
Cod Liver Oil Concentrate (White Laboratories Inc) Between 2558-2559
Combisul (Schering Corporation) 2563
Cremalin (Winthrop-Stearns Inc) 2551
Depo-Penicillin (Upjohn Company) 2555
Dexedrine Sulfate (Smith, Kline & French Laboratories) 2633
Diaparene (Homemaker s Products Corporation) 2559
Dulcet Tablets (Abbott Laboratories) 2565
Edrisal (Smith, Kline & French Labs) 2560
Eskadiamer & Eskadiazine (Smith, Kline & French Labs) 2641
Eskaphen B Elixir (Smith, Kline & French Labs) 2544
Flo-Cillin "90" (Bristol Laboratories Inc) 2629
Floraquin (G D Searle & Co) 2553
Furacin (Eaton Laboratories Inc) 2631
Gelusil (William R Warner & Co , Inc) 2556
Intraderm Sulfur Solution (Wallace Laboratories Inc) 3rd cover
Liquid Peptonoids (The Arlington Chemical Company) 2564
Liver Extract (Eli Lilly and Company) Between 2574-2575
Lyovac (Sharp & Dohme) 2574
Nucarpon (Standard Pharmaceutical Co , Inc) 2568
Obron (J B Roerig and Company) 2547
Octin (Bilhuber-Knoll Corp) 2550
Ovoferrin (A C Barnes Company) 2571
Par-Pen (Smith, Kline & French Labs) 2567
Pelvicins (Schenley Laboratories, Inc) 2639
Petrogalar (Wyeth Incorporated) 2653
Priscal (Ciba Pharmaceutical Products Inc) 2557
Privine (Ciba Pharmaceutical Products, Inc)2nd cover
Protein Hydrolysate (American Hospital Supply Corporation) 2549
Salmidol (Doak Co , Inc) 2568
Stramonium (Davies, Rose & Company, Limited) 2560
Thantis Lozenges (Hynson, Westcott & Dunning, Inc) 2558
Thephorin Ointment (Hoffmann-LaRoche Inc) 2570
Vi-syneral Vitamin Drops (U S Vitamin Corporation) 2561
Vitamin B Complex-MRT (Marvin R Thompson Inc) 2651

Dietary Foods

Pablum (Mead Johnson & Co) 4th cover
Strained Meats (Swift & Company) 2573

Medical and Surgical Equipment

Electrosurgical Unit (Liebel-Flarsheim Co) 2548
Orthopedic Shoes (Pediforme Shoe Co) 2563
Supports (Spencer, Incorporated) 2558

Miscellaneous

Cigarettes (R J Reynolds Tobacco Co) 2545
Color Pictures (Camilla Lucas Gallery) 2543
Cosmetics (Conti Products Corp) 2637
Flat Spring Diaphragm (Lanteen Medical Laboratories, Inc) 2572
Milk Stout (Whitbread & Co Ltd) 2552

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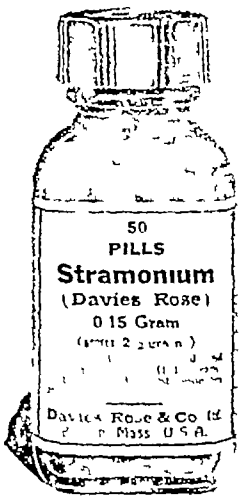
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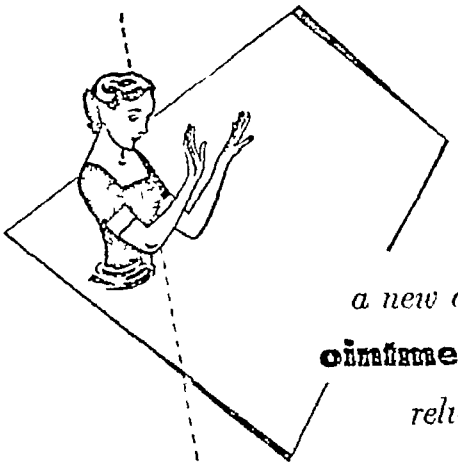
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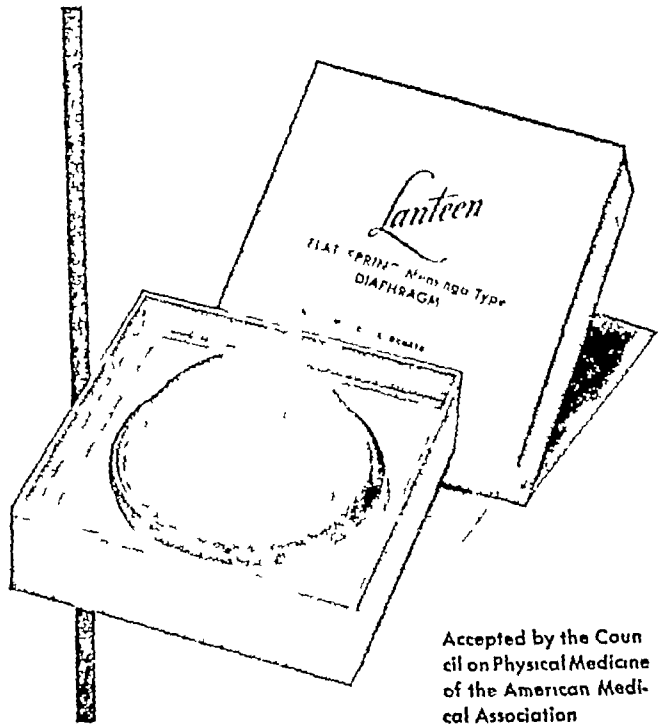
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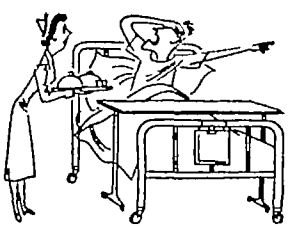
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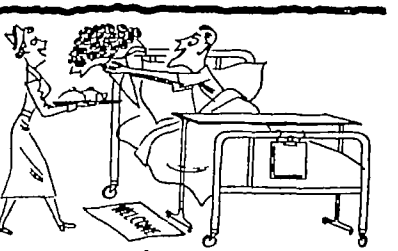
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VOLUME 48 DECEMBER 1, 1948 NUMBER 23

Editorials

Stop, Look, Listen, I

Attention of readers of this JOURNAL is directed to careful study of the twelve resolutions adopted at the General Assembly in Geneva, September 8 to 11, 1948, of the World Medical Association [1] These call for

1 Freedom of choice of physician by the patient. Liberty of physician to choose patient except in cases of urgency or humanitarianism.

2. No intervention of third party between physician and patient.

3 Where medical service is to be submitted to control this control should be exercised by physicans

4. Freedom of choice of hospital by patient

5 Freedom of the physician to choose the location and type of his practice

6. No restriction of medication or mode of treatment by physician except in case of abuse

7 Appropriate representation of medical profession in every body (official) dealing with medical care.

8 It is not in the public interest that physicians should be full-time salaried servants of the government or social security bodies.

9 Remuneration of medical services ought not to depend directly on the financial condition of the insurance organization.

10 Any social security or insurance plan must be open to the participation of any licensed physician, and no physician should be compelled to participate if he does not wish to do so

11 Compulsory health insurance plans should cover only those persons who are unable to make their own arrangements for medical care

12 There shall be no exploitation of the physician the physician s services or the public by any person or organization.[1]

Without dissent these principles were adopted by the delegates with the objective of the

promotion of closer ties among the national medical organizations and the physicians of the world, the maintenance of the honor and dignity of the medical profession, mutual consideration of professional problems of the medical profession in the different countries and exchange of information on matters of interest to the medical profession, the establishment of proper relations with similar groups (such as the World Health Organization the United

[1] J.A.M.A 138: 436 (Oct. 9) 1948

Nations Educational, Scientific and Cultural Organization), improvement of health throughout the world, and the promotion of world peace, aims which merit the support of every physician [2]

In discussing the twelve resolutions above cited, Dr Louis H Bauer, past president of the Medical Society of the State of New York, and secretary-general of the W M A, stressed the fact that

> Social insurance is in process of expansion almost everywhere, and particularly in Europe The International Association for Social Security and the International Labour Organization appear to be resolved to encourage a complete program of social insurance, embracing medical service for the entire world The Council of the World Medical Association recommended to the General Assembly at Geneva the initiation of an extensive inquiry, detailed and precise, to be reported on by the national medical associations with the view of arriving at correct information on the status of the subject in each country A permanent committee on social insurance was appointed by the General Assembly This committee will make every effort that doctors be not outdistanced in the matter of social security by the International Conference, which carries on its work on a permanent scale It is a matter of regret that, because of lack of organization, doctors always find themselves faced with accomplished facts when it is too late to suggest and to bring about modifications of decisions already taken [1]

Proponents of social security schemes and administrators of those already in operation are advocates of, and dependent upon, a captive medical profession Why? Because any insurance or social security scheme must be medically policed It is of no significance that the doctors wear no visible uniform, cap or badge—they are police agents of the scheme, whatever it may be

The delegates to the Geneva conference of the W M A are realists, as doctors they have to be, as citizens of many countries with long experience in fact of the actual operation of social security and insurance schemes they are embittered, disillusioned realists Can a realist be embittered? It would seem so in the sense that a pessimist can feel pain if in contact with a hot stove, for example Of this experience he can warn others The delegates have voiced their warnings in the twelve resolutions reprinted herewith

It is one thing to warn a profession and quite another to have those warnings translated into effective action Does anyone think those twelve cited warning resolutions were written merely to fill a vacuum? No, they are a call to action on a world-wide front, a hard core around which to carry on an aggressive, positive and effective resistance movement against the kind of thinking and scheming which would make of the medical profession a captive, a cat's paw, a servile tool of some soulless state

There is something every doctor of medicine can do about it He can become a supporting member of the United States Committee of the World Medical Association He can thus lend his moral and financial aid to the promotion of higher levels of medical care and public health throughout the world, and to the development of better international relations Do it now Send your contribution to World Medical Association, 2 East 103rd Street, New York 29, New York

[1] *Ibid* 137 1133 (July 24) 1948

Into the Open

"United Medical Service has declined to pay hospital vendors of professional service through the agency of an intern, a resident, or salaried doctor "[1]

We have been waiting for an announcement of this kind for too long a time Like every other, the medical profession suffers from inequalities within its ranks Such inequalities are inevitable—to a certain extent They arise from divergencies of ability, of opportunity, of political sagacity, of family and financial background

Practitioners fortunate in possessing the qualities we have mentioned usually attain

[1] U M S Medical Bulletin 3 0 (Sept) 1948

important hospital appointments, and/or university professorships. There is no quarrel with those who do In the majority of instances, cream rises inevitably to the top But we submit that the rise of the cream should stop there

Some hospitals have found it advantageous to pay salaries to members of their staffs Such monies as they may earn over and above their salaries go to the maintenance of the institution that supports them Universities have done the same thing Full-time professors are paid salaries. Their title and prestige attracts private patients, whom the professors are forced to treat whether or not they wish to do so, and what they earn over and above their salaries goes into the maintenance funds of their departments. Both practices sound eminently reasonable and fair to the trustees of the institutions, and to the few who receive the salaries, who prefer to accept a certain fixed yearly income, rather than to engage in the turmoil of ordinary private practice with its fluctuations of income, its dependence upon personal friendships, political adroitness, feeders and perhaps less savory methods of procedure

The medical profession is as full as any other of men whose wives complain that "all God's chillun got shoes—except her" Nor are doctors' hearts any more hardened than those of any other profession against the legitimate laments of their suffering families It is indeed surprising that as many doctors are as honest as they are For example, no one can testify with certainty that a patient is any worse off for having been relieved of a pair of cryptic tonsils or chronic appendix

Are we to subject the profession to further strains? Are the most respectable elements that support it to be allowed to contribute to its moral downfall? A doctor who holds any kind of a hospital appointment has a great advantage over one who does not Are we to submit passively to a further advancement of that advantage by encouraging hospitals and universities to pay him a salary to make money out of him, to pull the wool over his eyes by giving him free office space, secretaries, prestige?

Is that free enterprise? The question is at least debatable How many of the medical profession realize how nearly we parallel the worst kind of trade unionism with our specialty boards, our colleges of physicians and surgeons? We know very well that these institutions were conceived in the spirit of elevating the standards of the medical profession, and to a great extent they have done so But then, as everyone who has lived through two wars ought to know, the tide has turned the other way, and movements that started in virtue end up hardly distinguishable from the worst closed shop in their injustices

Abraham Lincoln remarked that a nation could not exist half slave and half free. Is his observation equally true with regard to the medical profession? The United Medical Service may be a little late in pronouncing, in no uncertain words, its verdict upon the questionable practices hitherto sanctioned in silence by the two most respectable bodies of men that should have the honor and the honesty of the medical profession near to their hearts These are the trustees of hospitals and the deans and boards of trustees of our university medical schools

Mr Lincoln's verdict that a nation could not exist half slave and half free has been amply vindicated It is praiseworthy that the United Medical Service has at last made a pronouncement of equal importance to the medical profession and we congratulate U M.S for its courage in having done so It will not pay "hospital vendors of professional service through the agency of an intern, a resident or salaried doctor"

Current Editorial Comment

Nonservice-connected Disabilities a Problem.

In a summary of its activities as of August 31, 1948 the Veterans Administration reported a total of 10,048 patients in hospitals of the 92,983 in Veterans Administration hospitals

61,091 were veterans with nonservice-connected disabilities, of the 12,065 patients not in Veterans Administration hospitals, 7,488 were veterans with nonservice-connected disabilities In addition, there were 14,342 beneficiaries in Veterans Administration homes

Eighty-nine new hospitals were in progress at the end of August, of which the construction contracts had been awarded for 28, the designs were in progress in 50, the designs not started in three, and the designs completed but construction contracts not awarded in eight Through the end of the month, 63 sites have been acquired for new veteran hospitals, 20 specific sites have been approved but not acquired, seven specific sites were in the process of selection, furthermore, 31 additions and conversions to the hospital addition and conversion program had been completed throughout the month and seventeen other additions and conversions were in progress

At the end of August, 18,560 veterans were awaiting hospital admission, of these 18,490 had disabilities adjudicated nonservice-connected, 77,277 applications for hospital or domiciliary care were received through the month, and 33,679 applications were filed for automobiles for disabled veterans [1]

The large number of nonservice-connected disabled may be expected to increase with the years The stresses of civilian existence are becoming such that it is not inconceivable that the distinction between such disabled and service-connected may have to be abolished eventually Is it significant that, as reported, 18,490 out of 18,560 veterans awaiting hospital admissions at the end of August, were nonservice-connected?

[1] J A M.A. 138 438 (Oct. 9) 1948

Of This and That The J A M A advises and this JOURNAL urges the utmost vigilance vis-à-vis the antivivisectionists and their legislative maneuvers [1]

As predicted when the antivivisectionists were exposed by the *Saturday Evening Post*, the magazine later was deluged with mail, some of which was commendatory, and some condemnatory One antivivisectionist went so far as to threaten to use his rifle on experimenters The *Post* publishes two columns of letters pro and con, one demands "Answer yes or no Are you or are you not going to print the other side of the vivisection question?" The following answer of the editors of the *Post* to this demand is significant "We made an exhaustive study of the pros and cons of vivisection before we published "They're Trifling with Your Life" Not one valid argument in support of the antivivisectionist viewpoint was found This being the case, we feel no obligation to publish anything more than the comments in these columns"[2-4] This ought to settle the antivivisectionist argument, but it will not The antivivisectionists are not capable of being convinced, and continued vigilance by physicians and other scientists will be necessary The antivivisectionists need constant watching even though they have not thus far achieved important legislative results [1]

In anticipation of the 1949 legislative session in New York State, we advise all those who have not done so to read carefully the original article of Dr Moon in the *Post*, and to refer to the editorial in this JOURNAL in which Dr Moon's article was briefly excerpted [5]

[1] J.A.M A 138 434 (Oct 9) 1948
[2] *Ibid* 138 132 (Sept 11) 1948.
[3] Moon, V H, and Wittels D G Sat. Eve Post 221 16 (July 24) 1948
[4] Letters to the Editor *ibid.* 221 4 (Aug. 28) 1948
[5] NEW YORK STATE J MED 48 2127 (Oct 1) 1948

Medical Society of the State of New York
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FACTS ABOUT NUTRITION

Prepared by the School of Nutrition, Cornell University, Ithaca
Norman S Moore, M D , Editor

Diet Inventory Methods for Doctors, I

The importance of the diet in both the preservation and the restoration of health is now generally known to alert physicians With this increased appreciation of the role that the diet plays, there is better understanding of the specifications for an adequate diet Because the physician knows, in spite of idiosyncrasy and custom, that a patient's diet must have calories and essential nutrients, he is in need of simple methods by which he can quickly evaluate a patient's food intake in terms of essential nutrients In hospitals and clinics the latter task is performed by a dietitian or nutritionist. Many physicians find it necessary, however, to inventory their patient's dietary status themselves. All physicians should become familiar with diet inventory methods and current technics, because much information about patients comes to light for the first time in a diet history The purpose of this article is to acquaint physicians with methods of interviewing which are successfully used by trained nutritionists when taking a diet history Two ways of determining a patient's food consumption are by personal interview or by a diet record kept at home by the patient In many instances a combination of the two methods is desirable, the information received from one source supplementing the other

Securing a factual diet history requires time, patience, and insight. Information on diet habits may prove to be more significant and more revealing than the actual food intake. It is therefore necessary to inventory many practices which influence food consumption A discussion of these practices should include the regularity of meals Many patients eat with no regularity, consequently they are frequently deprived of certain essential nutrients because of fluctuation in appetite or the habit of obtaining quick calories, usually weighted with carbohydrates The number of meals missed should be known to the physician, because patients who go without breakfast or lunch often at the evening meal double the calories missed during the day The usual time allowed for each meal reveals considerable evidence about the patient's emotional drive and tension and may be directly related to other symptoms, especially those involving the gastrointestinal tract Knowing with whom meals are usually eaten may help correlate the diet inventory with the medical history Persons who eat alone, or with someone with whom they are in conflict, often do not take sufficient calories or too many It has long been known that some worried, depressed or anxious people lose weight and that others overeat The latter fact appears to account for more cases of obesity among young people than does hormonal imbalance.

Many patients have pronounced likes or dislikes regarding certain foods The physician should ascertain the specific foods that are not liked Where meals are eaten should also be noted In some cases the money available or spent for food, in other cases the preparation and storage facilities available, or the kind and amount of supplements taken, will account for an unsufficient intake of essential nutrients. Data concerning exercise must be obtained and evaluated Likewise the use of laxatives and other drugs, especially the regularity as well as the amount consumed daily, should be known to the physician It is well for the doctor to

have information regarding the method used in the preparation of food One frequently finds a deficiency intake of water soluble vitamins because they had been extracted by the cooking water which was discarded

For the actual food intake, it is well to find out what the patient's customary breakfast, lunch, dinner, between meals, and before bedtime eating pattern is In the latter two instances the time and kind of food eaten may be revealing The object of a diet history is to ascertain the usual intake of food and the variation of this pattern Since many people are not aware of what they eat, one should be suspicious of the patient who recalls too easily It takes time and skill in follow-up to help them recall There is a small group in whom habits are so irregular that it is impossible to get a pattern After the diet history has been completed, it is a good policy to check on the daily consumption of certain important foods how much milk is consumed per day, how many eggs per week, etc If the answers do not check fairly well with the totals consumed at breakfast, lunch, dinner and between meals, the discrepancies should be "questioned out" In some instances it may be necessary to check the amounts of certain items of known composition that are purchased by the family

A diet record kept at home by the patient may be a useful adjunct A straight diary giving the following information may be used the time of day when food was eaten, the place where food was eaten, and the actual food eaten, with a description of mixtures and amounts The patient should be given careful instructions and told by what measurements the food should be recorded It is desirable that the record cover one week's intake, however, if a patient will not cooperate to that extent, three days including a weekend day will suffice Such a diet record frequently brings realization to the patient of what his real diet habits are

Now for the evaluation of the information by the time the diet data are recorded one may already have the answer The diet history may be evaluated in either a qualitative or quantitative manner The quick history taken in the office usually does not warrant, however, more than a qualitative analysis which is made most easily by comparison to an arbitrarily chosen dietary pattern

In the next issue the discussion of "Diet Inventory Methods for Doctors" will be continued and will be focused on comparative standards that the physician may use in evaluating data which he obtains from a diet history Whether a diet inventory is obtained by an interview or by means of a patient's diet record, a file card on which are printed headings for questions and space for data will be found useful Such a card which can be used for a permanent record has been prepared by the medical nutrition group of the School of Nutrition at Cornell University, and a sample card is available on request to either the editor of this JOURNAL or the director of the School of Nutrition at Cornell

Scientific Articles

COMPLETE PROLAPSE FOLLOWING HYSTERECTOMY

MORTIMER N HYAMS, M D F A C S, New York City

HYSTERECTOMY of any type must in some degree interfere with the normal anatomic supports of the uterus Conceding this to be true, it would be a logical supposition to anticipate prolapse of the remaining tissue structures as a natural sequence in some cases Judging from the relatively few references to this lesion which have appeared in the textbooks and gynecologic periodicals it would appear that it is not of frequent occurrence. Hamilton of England who made a survey of the literature and published his findings in 1943, stated that there are only a few references to the occurrence of this postoperative complication and that he had not discovered any paper directly concerned with the subject [1] From the fact that so few case reports or references could be found, he concluded that prolapse following hysterectomy must be comparatively rare. Considering the large number of uterine excisions performed in which bilateral oöphorectomy is also carried out, he thinks it strange that the induced *artificial menopause and its associated* loss of tissue tone does not increase the incidence of procidentia.

A recent survey of the literature shows an incidence of only 21 recorded cases of prolapse in 3,652 hysterectomies and six such complications reported by Culbertson and Phaneuf in which the total number of operations was not stated [2 3] Read and Bell and Davidson performed 770 total abdominal hysterectomies with only one case of subsequent prolapse, while in 283 vaginal hysterectomies performed by Babcock and Vineberg this complication never followed the operative procedure [4-7] In their series, six were recurrences following an antecedent operation for prolapse

Hamilton reported five of his own case histories three being subtotal, in which prolapse followed hysterectomy [1] Siddal and Mack cite one case, while Davis and Cusick in their series had no such complication following operation [8 9] McEwan in summarizing his hysterectomies, mostly subtotal claims that the operation actually cures upper vaginal prolapse [10] From the foregoing it is evident that many cases of postoperative prolapse have either been overlooked undiscovered, or not considered of sufficient import to merit a report which may account for the few references to the condition. Unsatisfactory or neglected follow up may explain other unreported cases. From the figures available, it appears that the subtotal is followed by five times as many cases of prolapse as the total excision of the uterus This could be cited as an operative disadvantage but considering Kennedy's estimate that 95 per cent of all hysterectomies performed in this country are of the subtotal type carried out by operators of varying degrees of skill and experience whereas total hysterectomy is usually done by the more experienced surgeons and in carefully selected cases, the five to one ratio of prolapse following subtotal operations does not appear so formidable [11] I do not intend to enter the controversial field of total versus subtotal hysterectomy but will confine *myself to the problem of* prolapse following the subtotal type and the presentation of an operative procedure a modification of the Kocher ventral fixation, which in my experience has given entirely satisfactory results with no complications or unsatisfactory postoperative sequelae

The care and management of the retained cervical stump is still a subject on which there is no consensus of opinion Many gynecologists believe that the cervix should not be retained when the corpus is removed Richardson pointed out that subtotal hysterectomy is properly applied to only four types of cases

1 Patients requiring hysterectomy for benign disease who possess perfectly normal cervices

2 Instances in which the operative hazard compels the execution of rapid and conservative surgery

3 Cases where for good and sufficient reason it is of paramount importance to preserve the menstrual function

4 Cases requiring hysterectomy during pregnancy [12-14]

He concludes that because of the reprehensible

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prevalence of benign diseases of the uterine cervix, notwithstanding its many advantages, conservative subtotal hysterectomy has only a limited field of application today Both in private practice and in clinical work, it is the exception rather than the rule to encounter a normal cervix in conjunction with benign pathology of the uterine corpus requiring its ablation

Admittedly controversial, the retained cervix must be mentioned because of its importance in the operative repair of procidentia following subtotal operation, should it occur, and also as a mechanical block in its prevention Phaneuf is of the opinion that the success of any type of operation for relief of procidentia depends on keeping the cervix well back, at right angles to the vagina [3] Hamilton advises that the cervical stump be supported by suturing the round and infundibulopelvic ligaments to it, so that the axis of the vagina is not brought into the same alignment with the direction of intra-abdominal pressure [1] In some clinics the ligamentous structures previously mentioned are disregarded entirely and, after the uterus has been excised, are left free in the pelvic cavity Others suture only one side leaving the other free, yet prolapse as a postoperative complication apparently has not been reported after these two latter procedures

While in the larger clinics the growing trend is definitely toward the total operation, statistics show that the majority of operators throughout the country still favor subtotal excision despite the fact that this type of operation is most often followed by prolapse as reported As an explanation of this extreme difference numerically, the fact that the total excision is technically more difficult plays an important role in determining the type of operation to be performed in a particular case In some instances the physical condition of the cervix may be the deciding factor between a total or subtotal excision, while the greater likelihood of a prolapse as a subtotal complication must certainly be given due consideration in all cases The retained cervix at times undergoes malignant degeneration, and many operators favor the total operation on the assumption that it is a prophylactic measure against this occurrence Whether or not carcinoma is more likely to develop in the retained cervical stump is open to question, but the possibility cannot be denied and, hence, must be considered from the prophylactic standpoint when selecting the type of operation to be performed

In discussing procidentia following total or subtotal uterine excision, reference must be made to the normal anatomic supports of both the uterus and vagina and their roles in the etiology Some interesting experiments to demonstrate the mechanism of uterine support and the part played by the various structures concerned were performed by Legendre and Bastien in 1858 and elaborated by Mengert in 1936 [15] In postmortem experiments with eight subjects traction was applied to each uterus by means of 1-Kg weights attached to the cervix by tenacula The paired structures attached to the uterus were then divided from above in varying sequences and the resulting uterine descent carefully measured Mengert reported the following results Section of the round, ovarian, infundibulopelvic and the upper third of the broad ligaments hardly affected the position of the uterus in the pelvis Section of the parametrial (lower two thirds of the broad ligament) and the upper two thirds of the paravaginal tissues allowed an average uterine descent of 10 5 cm The pelvic floor, although it was never incised, did not hinder experimental prolapse of the uterus and, therefore, could not have contributed to uterine support in any of the eight subjects He notes that marked descent of the uterus, amounting to actual prolapse, never occurred so long as any part of the upper two thirds of the paravaginal and/or the lower two thirds of the parametrial tissues was intact Of these two arbitrary divisions of the urogenital fascia propria, the paravaginal tissue seemed to be slightly more important, for its division allowed an average uterine descent of 6 9 cm as against 3 6 cm following division of the parametrial tissues These interesting experiments throw some light on the question of whether the vaginal supports are muscular or fascial There is no consensus of opinion on this point, but Frank attempted to clarify the situation by dividing the vaginal supports into two divisions, one a holding apparatus which he likens to the springs of a motor car, the other a supporting apparatus which he compares to the shock absorbers [16] He describes the holding apparatus as consisting of the pubocervical ligament or fascia, the cardinal ligaments, and the uterosacral ligaments The supporting apparatus consists of the levatores ani with the fascial envelope and the triangular ligament The *holding* apparatus controls the upper part of the vagina while the supporting apparatus controls the lower part Bonney also divides the supports into upper and lower *divisions* [17]

This classification of the normal anatomic supports makes it easy to understand the mechanism of prolapse, since its degree depends upon which set of supports is involved When prolapse follows subtotal abdominal hysterectomy, the upper supports are divided, since they are the only structures interfered with during this operation The fan-shaped fascia is not primarily traumatized, and, therefore, we should hardly expect any

increased incidence of prolapse as a postoperative sequel. However, as stated by Bonney, the uterus itself acts as a mechanical deterrent to prolapse, and if it is in its normal position of anteversion, the angle formed by the axis of the uterus and vagina tends to prevent descent of the pelvic tissues or structures Hamilton has presented a very plausible explanation for its being five times more frequent after the subtotal operation He states that after subtotal hysterectomy the axis of the cervical stump and vagina have a tendency to become aligned, thus favoring the occurrence of prolapse The cervical stump by holding the upper portion of the vagina open, tends to fashion this structure into a cylinder which he claims is easier to invert than the cone-shaped upper portion of the vagina which is formed following a total hysterectomy, due to the absence of the cervical stump, plus a shortening and reduction in the vaginal diameter Considering that total excision is usually done by the more experienced surgeons and in selected cases, the occurrence of prolapse would naturally be less frequent than in operations performed by men of varying skills. The cone versus cylinder theory is of value in clarifying to some degree the mechanics of procidentia following hysterectomy

Shaw, in 1934, stated that the most difficult cases of prolapse to treat are those following hysterectomy [18 19] Phaneuf, in 1935, recommended colpectomy, either partial or total, with removal of the cervical stump in cases of procidentia following total or subtotal excision which are not easily cured by the ordinary methods [8] Farrar utilizes the midportion of the cervical stump after dissecting off the mucous membrane in a modified Watkins interposition operation [20] Read and Bell and Davidson in four reported cases state that vaginal repair was done in two and ventral fixation of the stump in the remaining two [4 5] Many diverse procedures have been suggested and practiced for the relief of this condition The Manchester operation has been favored by some and good results have been reported, I personally have seen two failures following this procedure There can be no routine treatment of this postoperative complication, and what to do presents a problem which depends on the factors present in each individual case The age of the patient degree of prolapse complications previous treatment, and resumption of marital relations postoperatively must determine the type of therapy to be instituted. When an operation such as the Le Fort colpectomy is contemplated the patient should be informed of its after-effects on sex life even in cases where this situation does not have to be considered immediately

The paucity of clinical reports in the literature indicates the need for more case reports of procidentia following hysterectomy of any type as this complication does not appear until some time after operation Conscientious follow up should be the rule not the exception, of this phase of gynecologic surgery Only when this is done can we expect to obtain statistics worthy of the name which will aid us in evaluating the respective operations now performed for the relief of posthysterectomy prolapse

The foregoing brief review of uterine prolapse and its relation to hysterectomy, either total or subtotal, indicates the need for an operative procedure not too difficult technically, which will give firm support to the cervical stump and prevent subsequent recurrence Each case is a distinct entity, and all factors present in the individual patient must be considered and evaluated in selecting the type of operation suitable in the particular patient The technic of the operative procedure which has given me entire satisfaction and complete relief to the patient is carried out as follows

With the patient in the modified Trendelenberg position, a midline incision is made extending from the symphysis pubis to a suitable distance below the umbilicus, or the midline scar of a preexisting incision is excised

The fascia is exposed and incised in the line of incision The rectus muscle is separated in the midline and the peritoneum opened The intestines usually migrate from the pelvis or are manually displaced, leaving the operative field unobstructed The cervical stump is identified Allis clamps are placed on each round ligament close to the cervix, to be used for making traction to bring the cervical stump high up into the wound.

The bladder peritoneum over the stump is incised and the bladder pushed downward from the upper portion of the cervix (Fig 1)

The cervix is grasped with a single tooth tenaculum and the Allis clamps removed. An assistant applies traction to the tenaculum drawing the stump as high as possible into the abdominal wound This traction is maintained throughout the operation.

A suture of number 1 chromic catgut is introduced about 1 inch lateral to the midline and 2 inches above the level of the cervical stump through the anterior rectus sheath rectus muscle, posterior rectus sheath and peritoneum. A bite is then taken through the superior surface of the denuded cervical stump emerging on the opposite side of the abdomen through the peritoneum, posterior rectus sheath, rectus muscle and anterior rectus sheath The suture is left loose in the wound (Fig 2)

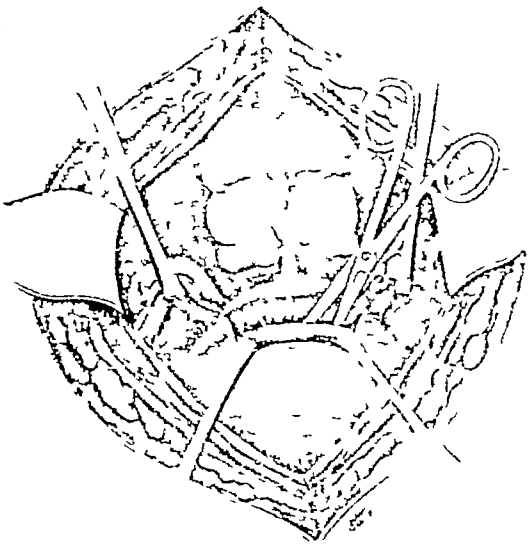


FIG 1 The peritoneum incised over the cervical stump and the bladder separated downward

The same procedure is carried out with a second suture introduced about 3/4 of an inch below the first suture

The cervical stump is held as high as possible in the abdominal wound by means of the tenaculum previously applied The peritoneum is then closed with a running suture, starting at the lower angle up to the cervical stump The s is carried around the upper or superior surf the stump, leaving a window through the toneum The balance of the peritoneum closed in the usual way (FIG 3) The fa next closed, starting at the lower angle of

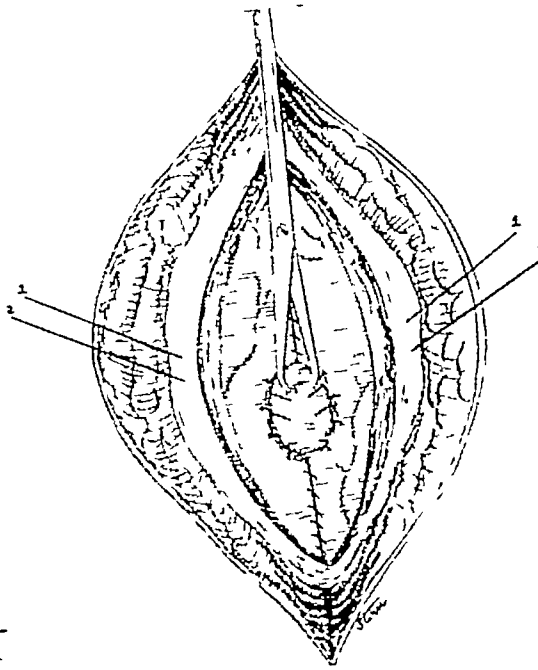


FIG 3 The peritoneum closed

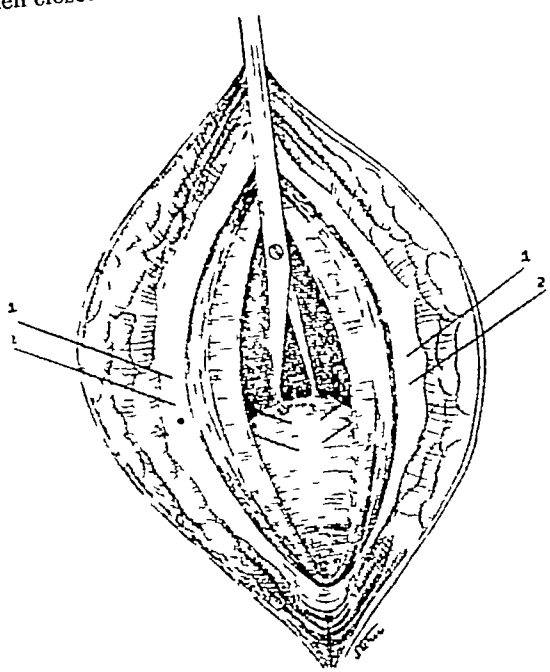


FIG 2 "Guy Sutures" (1, 1′ and 2, 2′), passing through anterior rectus sheath, rectus muscle, peritoneum on one side through the cervical stump and then out on the opposite side from the peritoneum through the anterior rectus sheath

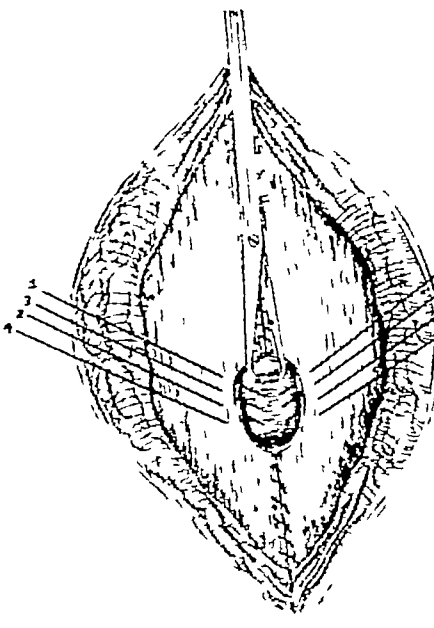


FIG 4. Interrupted sutures 3, 3′, 4 the fascia on one side through the c through the fascia on the opposite s

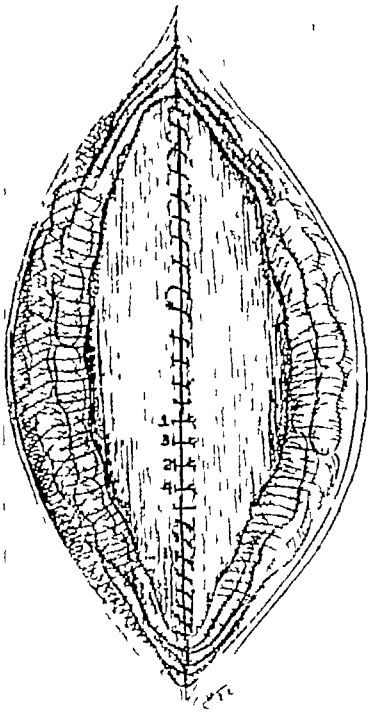


FIG. 5. "Guy Sutures," 1 and 2 tied. Fascial sutures 3 and 4 tied. The entire fascial layer closed.

cision until the window is reached. Two interrupted sutures are then introduced through the fascia on one side passing through the cervical stump and through the fascia on the opposite side and left untied (Fig. 4). The fascia is closed above the window. Still holding the cervix as high as possible, suture number one is tied, suture number two is tied (Fig. 5). The tenaculum is then removed. The two fascial sutures, numbers three and four, are tied. Skin closure follows, thus completing the operation.

If we accept the reported statistics that approximately 95 per cent of all hysterectomies performed are of the subtotal type and that prolapse is five times more frequent after this operation, the procedure which has just been described should have a definite place in the surgery of prolapse following subtotal hysterectomy. It is of little value in a postoperative prolapse where the cervical stump has not been retained. It is with the full knowledge of its limitations as well as of its proved value when performed in properly selected cases, that I offer the procedure for consideration.

Discussion

Joseph H. Cornell, M.D., *Schenectady*.—The subject of complete prolapse following hysterectomy is a very interesting one and as Dr. Hyams pointed out, very little space is given the subject in current textbooks and medical literature. I believe it is rare.

I wonder if most of the patients presenting this complication might have developed a prolapse had the subtotal hysterectomy not been performed. Too many times we see a patient in the fourth or fifth decade of life with a partial or complete prolapse of few months duration in whom no operation was ever performed whose last child was born fifteen or more years ago and who, during this interim had no reason to suspect the presence of any pelvic disorder. Dr. Hyams mentioned Kennedy's estimate that 95 per cent of all hysterectomies done in the United States are subtotal. Why is not the condition of prolapse seen in much larger proportion?

In my opinion when a subtotal hysterectomy is done either there is no gross evidence of damage to the supporting structures or it is perhaps overlooked only to have the prolapse become apparent some *time following the operation.*

The experiments performed by Legendre and Bastien in 1858 interested me very much, because these demonstrated that no descensus was noted when the upper ligaments about the uterus were divided. This is exactly what takes place in doing a subtotal hysterectomy.

By my preceding remarks I am in no way defending the subtotal hysterectomy since your discussor is presently making a statistical study of 400 consecutive hysterectomies personally performed of which 398 were total hysterectomies, and two of the subtotal type. The two cases of subtotal presented technical difficulties at the time of operation but I am happy to report that even these two retained cervices were subsequently removed by the vaginal route because of annoying vaginal discharge.

We have no laboratory or therapeutic test to demonstrate a normal cervix in situ or one that may become troublesome in later years. If a patient is destined to develop a cancer of the cervix she will, whether the body of the uterus is still attached or has been removed at operation.

Four months ago a patient on whom I had performed a subtotal hysterectomy eighteen years ago consulted me complaining of a vaginal discharge of two months duration. Visual examination of the cervix and confirmed by biopsy revealed an epidermoid carcinoma of the cervix. When I informed the patient of her condition, she replied: *Why didn't* you take it all out eighteen years ago? Never was I struck between the eyes with greater accuracy and at this point I changed the subject.

As for the management of prolapse following the subtotal hysterectomy, one is mostly concerned with the anatomy of the supporting structures which consist mainly of cervicopubic fascia, cardial ligaments, uterosacral ligaments, smooth muscles radiating out from the cervix along with the cardinal ligaments, levator ani muscles, and that portion of the endopelvic fascia extending from the cervix down the rectovaginal septum to the insertion into the perineum It is the tearing or stretching of these structures that results in the prolapse

In performing a total hysterectomy the above mentioned structures are restored to nearly normal anatomic relation, whereas in a subtotal operative procedure they are not altered

My approach of choice in a prolapse with a retained cervical stump would be to do a Manchester operation with shortening and fixation of the uterosacral and cardinal ligaments and fastening these to the strong suburethral fascia The Manchester operation, when correctly done, offers one of the best operative procedures in repairing tissue damage resulting from childbirth An alternate procedure would be through the abdominal route after displacing the bladder from the retained stump, the cervical stump is then dissected, and the vaginal canal entered This is then followed by shortening and fixation of the pericervical ligaments together with an anterior and posterior repair vaginally

I wish to compliment Dr Hyams on his success obtained with the fixation of the stump to the anterior abdominal wall and fully agree with him that each case is a distinct entity and all factors present in the individual patient must be considered in selecting the best operative procedure No other operative procedure will greater tax one's knowledge of anatomy, surgical skill, and judgment than the repair of complete prolapse following hysterectomy

References

1 Hamilton, J J Obst. & Gynec. Brit. Emp 50 184 (June) 1943
2 Culbertson, C Am. J Obst & Gynec. 30 874 (1935)
3 Phaneuf L *ibid* 30 544 (Oct.) 1935
4 Read, C D and Bell A C J Obst. & Gynec Brit. Emp 40 749 (Aug) 1933
5 Davidson, A. H Brit. M J 2 643 (Oct 7) 1933
6 Babcock, W W Surg. Gynec & Obst. 54 193 (Feb) 1932
7 Vineberg H. N Tr Am Gynec Soc 46 81 (1921)
8 Siddall, R S., and Mack N C Surg , Gynec & Obst 60 102 (Jan) 1935
9 Davis J E and Cusick, P L Am J Obst. & Gynec 19 246 (Feb) 1930
10 McEwan P Brit M J 1 574 (Mar 31) 1934
11 Kennedy J W Am J Obst & Gynec 13 506 (Apr) 1911
12 Richardson E *ibid* 32 641 (Oct) 1936
13 *Idem* Am. J Surg 27 408 (Mar) 1935
14 *Idem* Am J Obst & Gynec 30 237 (Aug) 1935
15 Mengert W F *ibid* 31 775 (May) 1936
16 Frank R. T Surg Gynec & Obst. 24 42 (1917)
17 Bonney V J Obst & Gynec Brit Emp 41 660 (Oct.) 1934.
18 Shaw W F Am. J Obst & Gynec 26 667 (1933)
19 *Idem* J Obst & Gynec Brit Emp 41 853 (1934)
20 Farrar L K. Surg Gynec & Obst. 60 827 (Apr) 1935

ACCIDENT PREVENTION

The only good accident is the accident that never happens We may view accident prevention with the eyes of the worker who thereby escapes disablement, or of the employer whose costs are substantially reduced by accident prevention, or in our own interest because the accidents that do not happen never become workmen's compensation cases for us to administer, or because as consumers we pay an exorbitant cost for accidents that could and should have been avoided One way or another, the problem is ours

On-the-job accidents to workers in the United States in 1947 resulted in the staggering total of 2,050,000 disabling injuries and 17,000 deaths, according to figures compiled by the National Safety Council. Work time lost as the result of these disabling injuries aggregated 280,000,000 man-days, which is equivalent to 1,000,000 men kept out of work continuously for more than a full year The cost of 1947 work accidents was approximately $2,600,000,000, of which one half, or $1,300,000,000, represented immediately visible costs to workers and industry, such as wage loss, expense of medical care, and overhead cost of workmen's compensation insurance The other one half, or $1,300,000,000, was the estimated value of damaged equipment and materials, production slow-downs, and time lost by fellow workers not disabled by the accidents —*From an address by Miss Mary Donlon, Chairman, New York State Workmen's Compensation Board, at Convention of International Association of Industrial Accident Boards and Commissions, September 13, 1948*

MISUSE OF INSULIN IN THE DIABETIC SYNDROME

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(From the Endocrine Nutritional, and Metabolic Service of Gouverneur Hospital)

THE causes of diabetes in man are unknown. Hyperglycemia is an excess of glucose in transport to tissues and organs. We may frequently incriminate the pancreas (pancreatic insufficiency as far as insulin is concerned) as the cause of hyperglycemia when the cause lies in disturbed peripheral utilization of glucose, in an overproduction of glucose, or in both Insulin, however, is useful in all types of diabetic syndromes. To be sure, insulin is the therapeutic agent to be used to prevent dehydration and acidosis in the diabetic patient if such a threat exists, regardless of the cause Insulin is truly the only antidiabetic factor available at present for therapeutic use, whereas diabetogenic factors are many After twenty-five years of the use of insulin, we are beginning to understand its action The pituitary, and possibly also other tissues inhibit hexokinase, an enzyme which is omnipresent in tissues Insulin removes that inhibition so that glucose can be phosphorylated into glucose phosphate and further metabolized, ultimately, to carbon dioxide and water

Additional factors, which retard the utilization of glucose and are, therefore, to be considered as diabetogenic may be listed as follows

1. Brain disturbances with temporary or permanent results following either trauma or psychic shock.

2 Acute infectious processes with either temporary or permanent consequences

3 Toxins or chemical products of infectious processes, allergic reactions, and ketosis

4. Hepatic disturbances such as grave deficiencies of the B vitamins and ascorbic acid or cirrhosis due to extensive deficiencies or possibly, overfeeding,

5 Excessive secretion of epinephrine by the adrenal medulla with temporary hyperglycemia or excessive secretion of certain steroids of the adrenal cortex with temporary or permanent hyperglycemia.

6 Disturbances during pregnancy which may be explained as associated with either the pituitary, hepatic, or adrenal mechanisms referred to above

7 Persistent hyperthyroidism

In treating patients with hyperglycemia and glycosuria, insulin use is too frequently being abused, particularly in the older age group Why should one administer insulin very cautiously in older diabetics?

1 To prevent obesity which, aside from the metabolic strain, puts a strain on the cardiovascular system

2 To prevent insulin shocks With lack of supervision, low blood sugar levels may be precipitated, causing symptoms which vary from headaches to mental disturbances. It is easily conceivable that, with protamine zinc insulin hyperglycemia and glycosuria may be changed during the course of a day insidiously but very extensively Low blood sugars may bring about mild to severe insulin reactions which go unrecognized because twenty four-hour urine specimens still show presence of sugar in the urine.

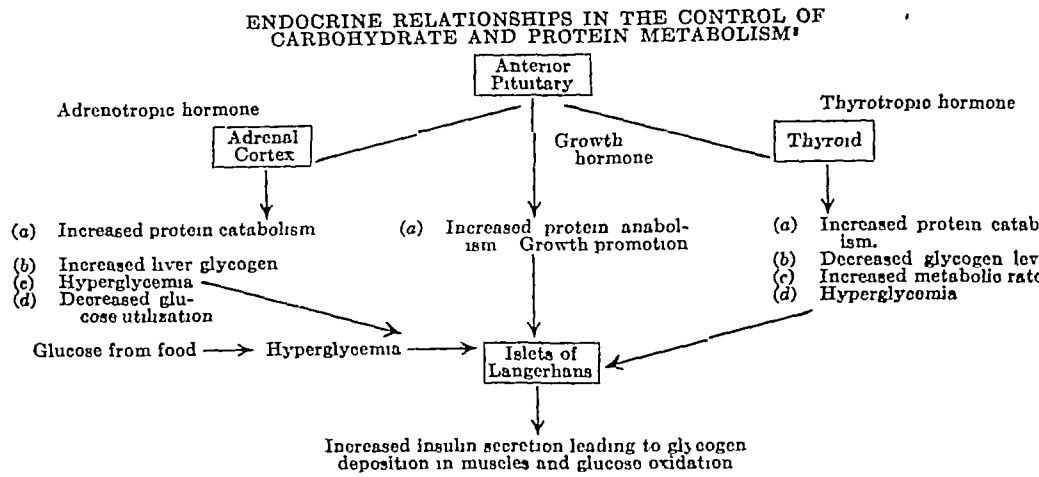
3 To prevent stenocardia and coronary insufficiency

We do not fully understand the relationship of obesity to diabetes. Biskind and Schreier suggested a mechanism by which overeating of easily available carbohydrates creates a lack of vitamins needed in the utilization of refined starches [1 2] A deficit of co-enzymes needed in the utilization of carbohydrates is created, the liver is damaged and diabetes may be precipitated in predisposed individuals C N H Long in the discussion of endocrine control in carbohydrate metabolism gave the following diagram (Fig 1)

If we are dealing with a weakened pancreatic reserve and can produce diabetes by pituitary injections, we can also produce it by continued hyperglycemia through the alimentary tract where a predisposition exists It is not within the province of clinical work to prevent pituitary hyperfunction as a diabetogenic factor, but we can prevent diabetogenesis through overfeeding in a given individual

Given an obese individual who develops diabetes, it is proposed that the individual not be given any insulin unless acetonuria coexists with the glycosuria Weight reduction is paramount in such cases Obesity is a prediabetic state in such individuals. One may well permit the optimal weight to be established by managing the diabetes in such cases with a minimal diet without insulin Out of 120 diabetics, weighing over 180 pounds each 108 (90 per cent) were treated without insulin by one of us (H S) In following a regimen of this nature one must naturally be

Presented at the Clinical Conference Gouverneur Hospital, November 20 1947



If hyperglycemia is too persistent or the stimulation of the general metabolism is too great i e rapid growth increased metabolic rate or excessive caloric intake, the insulin secretory mechanism may fail

FIG 1

on the alert for the occurrence of nutritional and vitamin deficiency

This is not intended to mean that patients now on insulin therapy should have mass withdrawal of insulin dosages by physicians who have not had sufficient experience with diabetes It is advised that one proceed cautiously, preferably by hospitalizing those cases to prevent the possibility of precipitating diabetic acidosis To be sure, there are severe cases of diabetes which would go into diabetic acidosis immediately on the withdrawal of insulin

The physician should exert caution by calling the attention of the patient to the fact that the appearance of acetone in the urine may lead to acidosis and coma When a patient develops a skin infection, the doctor need not necessarily treat the diabetes with insulin merely because of high blood levels, glycosuria, and skin infections In obese diabetics acetone in the urine is the only indication for which insulin therapy need be initiated promptly

Case Reports

Case 1 —I L , a male dwarf of forty-four years, had diabetes of eight years duration Insulin up to 80 units had been administered, and insulin shock and coma resulted The insulin was stopped for four years The patient was hospitalized during the period and was discharged without insulin

Case 2 —L K , age sixty-nine, weight 300 pounds fifteen years ago, suffered from diabetes of five years duration Insulin was administered prior to amputation of a limb and continued for six months in an attempt to control the diabetes Frequent insulin shocks were associated with profuse sweating and precordial pain Insulin was stopped, and diabetes is now controlled by diet alone

Case 3 —F P , a sixty-eight-year-old hypertensive cardiac and diabetic patient for many years, was an extremely nervous individual Because of large amounts of glucose in the urine, insulin was stepped up to 45 units per day Fasting blood sugar was 94 mg per cent Insulin was reduced to 10 units, and frequent precordial pains which occurred before have disappeared

Case 4 —O B , age fifty-two, weight 210 pounds, blood sugar 320 with sugar and acetone in the urine, was on insulin therapy for two weeks Controlled without insulin, the blood sugar level is 125

Case 5 —J G , age sixty-three, weight 185 pounds, had a history of duodenal ulcer of fifteen years duration, diabetes of one year duration He was urged by another physician to take insulin but refused He was under care for one month during which time glycosuria was ignored, since there was no acetone in the urine The man is sugar free at the present time, and diabetes is controlled with diet alone His present weight is 170 pounds

Case 6 —L M , age forty-five, weight 200 pounds, on a diet lost 40 pounds Blood sugar is 110, and there has been no glycosuria in the past year

Case 7 —A S , age seventy, weight 150 pounds, had diabetes of twelve years duration On 45 units of protamine zinc insulin and 15 units of regular insulin, frequent attacks of pain in the chest and sweating occurred Insulin is now being gradually reduced to much lower levels

Case 8 —W H , age thirty-three, weight 190 pounds, had an enlarged liver and atrophic glossitis A diagnosis of nutritional deficiency and diabetes was made Blood sugar was 350 mg per cent with 7 per cent sugar in the urine With diet and adequate amounts of vitamin therapy glycosuria disappeared completely Sugar tolerance is normal at present time by test

Case 9 —O V , age fifty-six, weight 170 pounds, was hospitalized with glycosuria and acetonuria The patient was on insulin for one week The patient was then put on an adequate diet and is now sugar free with normal sugar tolerance

Conclusions

Many factors, known and unknown, are dia-

betogenic in man Insulin is the only antidiabetic factor to be used in all cases of juvenile diabetes (true insulin deficiency) and dehydration and acidosis in the diabetic syndrome, regardless of cause Insulin is *not* to be used in obese diabetics and in other older diabetics before dietary measures have been applied and before other diabetogenic factors have been investigated

The importance of the checking of blood sugars in insulin-treated cardiac patients or in older people who are not cardiac patients needs to be stressed

The cases managed without insulin may fall into the hands of clinicians in other specialties who are too apt to ascribe complications to lack of control of diabetes Better understanding of the rationale of the regime would greatly benefit the patient The use of insulin in older, obese diabetics frequently becomes an easy substitute for education of the patient in the use of appropriate diet Consequently, as more food is taken the insulin is increased because of continued glycosuria The results include uneconomic use of insulin with possibly dangerous reactions Obesity and hyperglycemia persist despite the insulin dosage, which probably could have been minimal or done without completely

Refences

1. Blaklnd, M S., and Schreier H Bull. New York Acad. Med 21 436 (Aug.) 1945
2. *Idem.* Exper Med & Surg. 3:437 (Nov.) 1945.
3. Long C. N H: Proc. Am. Diabetes A. 2 99 (1942

PRIZE ESSAYS

The Merrit H Cash Prize and the Lucien Howe Prize will be open for competition at the next Annual Meeting of the Medical Society of the State of New York, May 2 1949, in Buffalo

The Lucien Howe Prize of $100 will be presented for the best original contribution on some branch of surgery, preferably ophthalmology The author need not be a member of the Medical Society of the State of New York.

The Merrit H Cash Prize of $100 will be given to the author of the best original essay on some medical or surgical subject Competition is limited to the members of the Medical Society of the State of New York, who at the time of the competition are residents of New York State.

The following conditions must be observed

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SPINAL ANALGESIA AND ANESTHESIA IN OBSTETRICS

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THE advantages of the ideal regional anesthesia in obstetrics are well known The immediate spontaneous cry of the wide-awake baby, the physical well-being of the pain-free mother, and the minimal blood loss have all been emphasized in countless publications However, although an immediate cry is a satisfaction, adequate means of resuscitation have reduced infant mortality due to drug depression to a minimum Properly utilized oxytocic drugs will generally give adequate postpartum uterine contraction and retraction and proper use of amnesics, analgesics, and general anesthetics will in the majority of cases spare the mother the physical pain and mental anguish of parturition

The factor mainly responsible for our search for a desirable regional block was the comparatively high incidence of aspiration of stomach contents which occurred during emergence from general anesthetics Three cases were followed in as many months which showed aspiration of fluid gastric contents giving the asthmatic type of reaction in the lungs [1] These cases are of interest in view of the prolonged x-ray evidence of diffuse pulmonary involvement in spite of negative clinical signs and symptoms It would seem, when one remembers the prolonged emptying time of the stomach and the frequency of an uneven anesthetic course in the often poorly prepared patient, that this complication may, in many cases, be the unrecognized cause of postpartum morbidity

Although continuous caudal anesthesia has been widely acclaimed as the ideal anesthetic for properly selected cases, the increasing number of reports of purely anesthetic complications has been a deterring factor in setting up the technic in our locale with its minimum of trained medical anesthetists and absence of an adequate obstetric resident staff Too frequently, one reads of such complications as infections at the site of injection, rare cases of arachnoiditis, prolonged periods of urinary retention, transitory periods of paralysis, paresis, or areas of anesthesia, and, although few, still too many maternal deaths from anesthetic causes, or possible instances of fetal mortality due to toxicity of large concentrations of the local anesthetic drug [2 3]

Parmley and Adriani's article on low spinal or "saddle" block anesthesia using nupercaine in obstetrics indicated a method with all the advantages of continuous caudal block and few of its major disadvantages The drug was long acting, giving up to three hours of complete pain relief, there was no chance of contamination and subsequent infection at the site of needle puncture, neurologic complications with such small concentrations of the drug are almost impossible, and there can be no drug reaction [4] With careful attention to technic of administration, the mother's life should be beyond danger, in the presence of a skilled obstetrician the baby's life is subjected to a minimum of risk

Neuroanatomy

The afferent nerve supply of the uterus was shown by Cleland in 1933 to consist of two components—the pain of uterine contractions through the eleventh and twelfth thoracic dorsal roots, and that of stretching the birth canal through the sacral nerves, possibly sacral two, three, and four [5] This was confirmed in 1945 by Frankel, who showed that anesthesia to the eleventh thoracic segment caused either no change or improvement in strength of contractions, from the sixth to the tenth thoracic segments some slight diminution of the strength of contractions, and interruption of labor to be the rule with anesthesia to thoracic four and above [6]

In this paper our first 100 cases of spinal anesthesia, in which we used nupercaine in obstetrics, are reported It was found that for complete relief of pain the anesthesia should extend to the tenth thoracic segment For the early cases the technic of Parmley and Adriani was followed, but since too many patients experienced incomplete relief of pain, in some cases requiring nitrous oxide for the application of forceps or at the time of delivery, the technic was altered somewhat to give slightly higher anesthesia and more consistently good results

Technic

During early first stage the patients were given demerol or demerol and seconal to control extreme discomfort The indication for starting the spinal was the presence of an engaged head with three or four fingers dilatation in multipara and full dilatation in primipara As others have pointed out, it was noted that if the anesthetic was given before the head was engaged and dilata-

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tion well advanced, the progress of labor was arrested and advancement would only recur after the spinal had worn off " " If possible, the spinal was administered in the delivery room but some were given while the patient remained in the labor room

One-half cubic centimeter of 1 200 nupercaine was mixed in a 5-cc. syringe with 1/2 cc. of 10 per cent dextrose. The patient was placed in the sitting position with the legs over the side of the table, the back arched, and the arms around the shoulders of an assistant. After preparing the back with zephiran, a skin wheal was raised over the second lumbar interspace using 1 per cent procaine. The tap was done at this level, the syringe attached and 1/2 cc of spinal fluid aspirated and mixed with the prepared solution. The solution was then injected as rapidly as gentle pressure on the plunger would allow The patient remained in the sitting position for fifteen seconds after the start of the injection and then returned to the supine position—flat with head on a pillow Care was taken not to inject at the time of a contraction, since cerebrospinal fluid pressure is raised at that time, causing a wide diffusion of the drug.

The patient generally noticed the next pain to be diminished in intensity and had no sensation with subsequent contractions. There was complete perineal anesthesia, with anesthesia or hypesthesia extending over the legs and the abdomen to the level of the tenth thoracic segment. If the hypesthesia did not reach almost to the level of the umbilicus, the patient felt some discomfort with the contractions There was some motor weakness of the legs, but the abdominal muscles retained their normal contractile strength. The ability to "bear down" was thus retained, provided the patient was given proper instruction. All the anesthetics in this series were given by one of three members of the anesthetic department and were either watched constantly by them or by a nurse anesthetist

Results

Pain Relief.—There was complete pain relief in 89 per cent. Two cases in this group were given supplemental nitrous oxide because they had been poorly selected from the psychologic standpoint. They became very restless, apprehensive, and uncooperative These cases demonstrate the importance of evaluating the patients' ability to cooperate and receive benefit from regional procedures. This should be done during their prenatal visits, long before admission to the hospital. One case of face presentation was given deep ether to obtain sufficient uterine relaxation for version and extraction.

Pain relief was incomplete, but no supplemental anesthesia was needed in 3 per cent. These patients experienced some pain or pressure during the application of forceps or delivery

Pain relief was incomplete with supplemental anesthesia needed in 9 per cent. Five cases had nitrous oxide for short periods (from two to five minutes), generally at the time of delivery The most frequent complaint was pain in the region of the ischial tuberosities This occurred in the early cases when the site of injection was lumbar three or four, rather than at lumbar two In one case the anesthetic was definitely inadequate, probably because of partial displacement of the needle during injection In two cases the anesthetic was given before cervical dilatation had started, labor failed to progress, in spite of continuing contractions, until the spinal had worn off Both patients were delivered hours later under general anesthesia.

The duration of the procedure from the time the spinal was given until completion of episiotomy repair ranged from ten minutes to five hours. The average duration was fifty five minutes. The longest effective duration of a single dose was three hours Three patients received two spinals each.

The Course of Labor.—In those patients who received their anesthetic prior to full dilatation, the remainder of first stage seemed to be definitely shortened The observation of others that second stage was considerably prolonged could not be made on this series because of the high incidence of low forceps (Table 1) However, it was noted that, in spite of the retention of full expulsive force of the recti muscles and the continuance of contractions of the same frequency and duration as before anesthesia, in many instances the descent of the head did not progress as rapidly as in the case of the unanesthetized counterpart. It should be mentioned that, if labor is to progress satisfactorily, each patient must be watched constantly and coached as to the time of contractions. This is a distinct disadvantage to the technic at a time when nursing personnel are few and their duties heavy

TABLE 1.—TECHNIC OF DELIVERY

Spontaneous	15
Low forceps	58
High midforceps	2
Persistent OT or OP requiring rotation	21
Breech	2
Face presentation with version and extraction under deep ether	1

Persistent occipitoposterior and transverse position also occurred with greater frequency This was doubtless due to the complete relaxation of the pelvic floor with consequent loss of the firm base on which the head turns prior to delivery However this same extreme relaxation facili-

tates greatly the necessary manual or instrumental rotations and the application of forceps for delivery

The two breech presentations noted were delivered spontaneously without difficulty

Of special note are two patients with mitral stenosis and low cardiac reserve Both cases had been confined to bed for periods of two and three months prior to delivery Both had had one previous pregnancy and delivery with a period of acute cardiac decompensation postpartum At the time of delivery both had basilar rales Spinal anesthesia was given at four fingers dilatation with the head engaged When fully dilated, the patients were asked to bear down with the contractions and exhibited marked increase in pulse rate with each effort High midforceps were applied with ease, and the babies were delivered without difficulty The blood pressure remained stable The cardiac status improved following delivery One mother exhibited a mild psychosis for three days postpartum with complete recovery Six and eight months later both mothers and babies were well

The blood loss, as expected, was minimal, averaging 255 cc per case as compared with 355 cc per case in an equivalent number of cases under general anesthesia

Condition of the Baby —Ninety-one babies cried immediately and spontaneously One was slow to cry Five babies required brief periods of oxygen and resuscitation Of the two cases in which the spinal was given prior to the beginning of dilatation and who were delivered hours later under ether anesthesia, one was apneic and, in spite of intubation and resuscitation, spontaneous respirations could not be initiated Postmortem showed bilateral atelectasis

There was one stillborn, in which case no fetal heart could be heard prior to the induction of the anesthetic

Three of the babies died within the first 72 hours One had a tracheo-esophogeal fistula and one was a six and one-half months premature The third case was a difficult forceps delivery as a persistent posterior Repeated attempts to rotate the head failed due to a narrow midpelvis The baby cried immediately but soon showed paralysis of the right face and left arm and bilateral spastic legs At postmortem a fractured skull and intracranial hemorrhage were noted

Complications

Headaches were the most frequent and most troublesome complication early in the series and, in some cases, were of such severity that at one time the abandonment of the technic was considered However, following the suggestion of Weintraub, who bases the occurrence of postspinal headaches in the obstetric patient on orthostatic hypotension, a tight abdominal binder was applied to each patient when she left the delivery room and was left in place during her hospital stay [8] Since then, although headaches are still frequent, the intensity has not been severe or prolonged, and they have been controlled by small doses of aspirin

Incidence of headaches believed to be due to anesthesia was approximately 30 per cent A follow-up of 50 cases over periods of from three to six months postpartum showed that 19 patients (38 per cent) had had headaches, 43 patients (86 per cent) would desire another spinal should they have another delivery, and seven patients (14 per cent), most of whom had had incomplete pain relief, said that they would not have a repeat spinal

There was only one complaint of backache

Nausea and vomiting were rare, occurring in only five cases

In the majority of cases there was a minimal drop in blood pressure of 10 to 15 mm Hg, symptomless, requiring no treatment and probably due to alleviation of pain For the first 15 cases, methedrine was used as a prespinal vasopressor Four of these cases exhibited a sharp rise in blood pressure, two of which experienced transitory, severe headache Since the deletion of all pressor drugs from the technic, this has not recurred

There were four cases with acute drops in pressure to levels below 80 mm Hg systolic These immediately responded to small intramuscular injections of neosynephrine and were symptomless One pre-eclamptic showed a drop from 160/100 to 120/80 and stabilized at that level Urinary retention occurred with no greater frequency than with other methods of delivery Neurologic complications were absent Pulmonary complications were absent There were no maternal deaths

Summary

A series of 100 deliveries using spinal anesthesia with nupercaine, 1 200 plus 10 per cent dextrose for late first stage and second stage labor, is reviewed An estimation of the results may be grouped as follows

1 Excellent, 83 per cent In this group the anesthesia and obstetric course were completely satisfactory

2 Good, 11 per cent Of these, two cases had marked rise in blood pressure with headache during delivery The remaining nine patients had some minor complaints, some requiring nitrous oxide for short periods

3 Poor, 6 per cent One had inadequate relaxation for version and breech extraction Two cases were uncooperative and psychically poorly

chosen In two patients the spinal anesthesia was given too early, and labor was temporarily stopped One spinal was definitely inadequate

As the technic has been altered from time to time to meet our needs during the early cases, it is felt that the number of excellent results would be much higher with a later group of cases

Conclusion

The frequency of aspiration pneumonia after general anesthesia in the often poorly prepared obstetric patient is a definite indication for the use of regional technics.

Spinal anesthesia, with its simple technic, would seem to have all the advantages of continuous caudal anesthesia without many of its disadvantages. Three things are of major importance for its safe and successful use a patient psychically suited to regional procedure, a carefully standardized technic to obtain consistently good results, and a well-trained obstetrician, so that the increased number of complicated instrumental deliveries will be safely managed

Discussion

E. G Waters, M.D., *Jersey City New Jersey* — Our common use of spinal has been as a terminal anesthetic, with labor termination preordained. We have never used it as an analgesic for second stage of labor although we have been miscredited with so doing Our *hopes are certainly in concert* with all who look for the consummate agent for block analgesia and anesthesia.

The effect sought by Dr Snell is more prolonged and more complete pain relief, and, therefore he wisely and properly does not attempt a saddle block, but rather anesthesia to the tenth dorsal segment. My own experience with nupercaine in dextrose is limited but suggests so far that a much less toxic form of drug must be sought which will give long relief without headaches

I do not believe Dr Snell s cases were broken down for patient parity which is extremely important in considering labor duration and type of termination In addition I question the explanation given for arrested occiput transverse and posterior positions in this as well as caudal anesthesia In this present series, the average duration from induction of the spinal anesthesia to the episiotomy repair averaged fifty five minutes, with ranges from ten minutes to five hours. The longest single dose lasted three hours, and only three patients had more than one injection. Certainly fifty-five minutes, or three hours for that matter, cannot be considered too long as a second stage and I would seriously question the need for 21 rotations, two midforceps and 58 low forceps in a group of 100 deliveries when the total elapsed anesthetic time was so short. But again, I would insert my own belief that low forceps control and episiotomy under good anesthesia is the best way to deliver most primipara and many multipara. In the present discussion I suggest that the human tendency—and I certainly stand as no exception—is to shorten the 'waiting time when such a method as this one is used

I wish to be understood as being in full accord with attempts to provide, through regional and local anesthesia, progressively better, longer safer and more effective pain relief to women during labor and parturition Not infrequently, however methods are proposed which cannot reasonably be expected to give the relief for which they are designed Obviously, the anesthetic agent in block and local anesthesia must come into contact with the upper neurones or the peripheral nerve fibers supplying the area of hoped-for anesthesia in order to be effective During labor, it is also important not to block the motor sympathetic fibers to the body of the uterus and thereby totally arrest labor Since the visceral efferent pain fibers of the uterus pass by way of the presacral plexus to the cord at the eleventh and twelfth dorsal segments, while the motor sympathetics leave the fourth to sixth dorsal through the vascular nerve mesh of the aortic, hypogastric, and uterine vessels it is clear that pain relief may be achieved without loss of motor effectiveness If the anesthetic agent reaches the tenth or eleventh but stays below the seventh segment.

It is also clear that a true saddle" block will relieve pain originating in the cervix, vagina, and perineum, through effect upon the nerves of the lumbosacral trunk and the parasympathetics. However it cannot hope to relieve the pains associated with uterine contractions, and since first stage pains are due to uterine contractions, while second stage pains consist of these plus the pains of cervical, vaginal *and perineal distention and stretching, it is entirely* unreasonable to expect from a low and fixed spinal anesthetic agent, complete second stage relief

We have been using spinal anesthesia in obstetrics since 1920 and have tried nearly all the drugs and combinations, good and bad With 30 to 50 mg of novocaine properly placed in the spinal canal, complete pain relief for delivery is obtained, lasting from thirty to ninety minutes. The minutes become very long when watching a grudgingly distending perineum, and especially so if the combination of pain relief drug analgesia, and abdominal relaxation have all but obtunded patient effort

Dr Snell s interpretation of his results is fair and the claims are not exaggerated It is this type of critical analysis and honest appraisal that aids most in determining a procedure s ultimate worth

William J Gleason, M.D *Jersey City New Jersey* —Our experience with spinal analgesia and anesthesia in obstetrics dates back to the late 1920 s, when Dr S A. Cosgrove pioneered in its use and reported his findings and observations in several articles Since that time, spinal anesthesia has always been in favor in our clinics, as attested to in the literature. We believe that ours is the most extensive obstetric use of spinal anesthesia of any clinic in this country We are happy to hear that many others are now adopting it.

We have always said that spinal anesthesia had no place in the first stage of labor but had definite usefulness as an anesthetic method where labor was to be operatively terminated and in many

cases, it is the anesthetic of choice Our chief reason for such teaching was the high incidence of forceps deliveries, necessitated by its use with the particular technic we were using Like Dr Snell, we have been intrigued by the work of Parmley and Adriani with heavy nupercaine The drug is not new, the technic is. Nupercaine was used by us in 1929 in a different form, but its use was discontinued because of severe persistent headaches I might parenthetically remark that the headaches with heavy nupercaine still seem more persistent and severe than with some other drugs, particularly pontocaine and glucose Effecting true "saddle" block seems easier with it, however, than with other combinations, and motor paresis and paralysis of the legs does not seem so bothersome to the patients

We use "saddle" block for many type operations, and, at present, we are running a series of cases in obstetrics with this new technic to see if it modifies our old concepts When we have 500 cases, we expect to report our experiences on its use As yet, we still feel that it is not wise to use spinal analgesia unless labor is to be operatively terminated

I personally believe that it is superior to caudal analgesia because of its simplicity, along with the other reasons Dr Snell has mentioned It may eventually replace caudal analgesia in many clinics We are not prepared at present definitely to pigeonhole it Our results parallel those of Dr Snell and his coworkers It is only a method for use when skilled obstetricians are handling cases This should not handicap its use but augment it There is some risk and a price to pay for all analgesic and anesthetic methods As Dr Snell has pointed out, the babies are in no way jeopardized In fact, large series of cases may show that with this technic fetal morbidity and mortality may be less than in cases that have no anesthesia, the reason being that tumultous labors in multipara are slowed down to the proverbial walk, allowing patient, baby, obstetrician, anesthetist, and, particularly, the nursing staff, literally and figuratively to catch their breath This is often of great value on a busy labor floor It is useful in long-labor primipara, where one wishes to give the mother temporary respite I am sure its use will be extended to some of the medically and obstetrically complicated cases with great success

With regard to technic, we now use only 5-mg dosage, but still use the hypo syringe rather than the 5 cc advocated by Dr Snell We found that with 2 5 mg many of our cases did not get relief from uterine contraction pain, despite perineal anesthesia, which lasted in some cases six or seven hours We feel, with many others, that it may shorten the first stage of labor but prolongs second stage, necessitating the use of forceps, as with spinals, if used for analgesia alone

Returning to the subject of headache, our highest incidence was 17 per cent Dr Snell's figure of 30 per cent seems quite high It certainly is one great obstacle in the use of subarachnoid drugs The other is the high incidence of necessary forceps deliveries Even this may be considered good obstetrics by some schools Even when not used with this particular technic, spinal anesthesia is an ideal method for forceps extractions, particularly in respect to baby salvage

Dr Snell stated that his prime object in the use of spinal anesthesia was to eliminate the possibility of aspiration, pneumonitis, and bronchiolar spasm While such ideals are commendable because of the gravity of this condition, which we also have experienced many times, nevertheless, a number of cases will be admitted and delivered where the time factor will not permit the use of spinal These cases will, for some time, be an ever-present potential danger Vomiting and aspiration with resultant pulmonary complications have a high incidence in obstetrics, due to precipitous-like labors in multiparous women who have eaten shortly before their onset It takes but little gastric juice to cause severe reflex spasm in the bronchial tree

I can only agree with most of Dr Snell's conclusions We all hope for the day when the parturient will have one dependable safe method of analgesia and anesthesia instead of the variegated patchwork in use today Up to the present, we are intrigued but not convinced that this method settles many of our difficult problems

References

1 Mendelson, Curtis L Am J Obst. & Gynec 52 191 (Aug.) 1946
2 Hingson Robert A J A.M A 126 1129 (Dec 30) 1944.
3 Siever James M ibid 125 327 (June 3) 1944
4 Parmley Ray T and Adriani John South. M J 39 191 (March) 1946
5 Cleland J G P Surg Gynec & Obst. 57 51 (July) 1933
6 Frankel Donald S ibid 80 66 (Jan) 1945
7 Hinebaugh M C Jr , and Lang W R Ann Surg. 120 143 (Aug) 1944
8 Weintraub, Frederick Antine, Williams and Raphael Albert J Am J Obst. & Gynec 54 682 (Oct) 1947

HIGH-FAT DIETS DECLARED BAD FOR HEART PATIENTS

Warning against a high-fat diet for patients with heart disease was sounded by Dr Milton Plotz, of Brooklyn, at the meeting in Chicago of the American Medical Association Deaths of 10 heart patients within seven months after being put on a high-fat diet, and much worse heart symptoms in 12 of another group of 17 within three months after being put on a high-fat diet, were cited by Dr Plotz The high-fat diets had been given most of the patients as part of standard treatment for stomach ulcers One of them was given the diet to "build him up" •Ulcer patients who have heart disease, Dr Plotz warned, should be given frequent feedings low in fat —*Science News Letter, July 10, 1948*

HABITUAL ABORTION

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HABITUAL abortion is an obstetric term used to classify patients having recurrent spontaneous abortion. There is no general agreement as to how many are actually required The *arbitrary number three has been used to desig* nate such a patient in this article Further division of these patients into two groups as follows has been found to be advantageous

Group I. Primary Habitual Abortion —These patients are essentially primiparas who have had three or more consecutive spontaneous abortions beginning with the first pregnancy

Group II. Secondary Habitual Abortion.—Such patients are multiparas who have sustained three consecutive spontaneous abortions after delivery of one or more immature, premature or full-term infants.

An abortion is defined as the termination of pregnancy at twenty two weeks or less resulting in a fetus weighing 500 Gm or less. A complete classification of terms is provided in Table 1

TABLE 1.—CLASSIFICATION OF INFANTS ACCORDING TO WEIGHT AND DURATION OF PREGNANCY AT THE TIME OF DELIVERY

Classification	Birth Weight (Grams)	Duration of Pregnancy (Weeks)
Abortus	0 to 500	0 to 22
Immature	501 to 1 500	22 to 30
Premature	1,501 to 2 500	30 to 36
Full-term	2,501 and over	36 to 40

Incidence

During a fifteen year period (1933 to 1947) 56,803 pregnancies were cared for at the Woman's Clinic. One hundred eighty nine were classified as having primary habitual abortion, an incidence of 1 in 300, and 115 were considered as having secondary habitual abortion, an incidence of 1 in 493

The primary group consisted of 123 patients who had a total of 669 pregnancies, while the secondary group of 88 patients had a total of 679 pregnancies, giving a total of 1,348 pregnancies for statistical evaluation The obstetric performance before and after classification irrespective of any treatment can be seen at once in Table 2 The uncorrected abortion rate was 76 and 57 per cent for the primary and secondary habitual abortion patients respectively This is a remarkable incidence when one considers that the abortion rate for the entire clinic population is only in the neighborhood of 10 per cent.

Clinical Investigation

Each patient had a careful history, physical examination, and laboratory study Only the pertinent findings will be mentioned The average age in both groups was thirty-one years, which is eight years older than the average clinic age. Twenty-five per cent were elderly primiparas, that is over thirty five years of age. There was no significant racial distribution.

Obstetric complications occurred more frequently in both groups of patients than in the control clinic population. Nausea and vomiting were found in 87 and 60 per cent, respectively Toxemia of pregnancy, threatened abortion, and placenta previa also had higher incidences in the primary and secondary abortion patients.

Gynecologic complications, such as retroversion, were frequently observed, while myomauteri, double uteri, and cervical and endometrial polypi had a higher incidence. Detection and correction of gynecologic pathology forms an important part of the treatment.

From the laboratory standpoint the Wassermann was positive in 6 per cent and 7 per cent of the patients in the primary and secondary groups, respectively Anemia (hemoglobin below 70 per cent) was detected in 15 per cent and 17 per cent in each group, which is about double the clinic incidence. The Rh factor showed no significant variation from the expected percentages The basal metabolic rate was low in 65 per cent and 50 per cent of the patients in each group Vitamin C and prothrombin determinations were sometimes low, and other patients had normal values Vitamin E and progesterone studies were not performed.

Treatment

It was necessary to divide the treatment into three types, the results are provided in Table 3 A description of the various types of treatment follows

Type I Therapy —There were 189 pregnancies in the primary habitual abortion patients and 101 in the secondary group For practical purposes, they received no treatment since they had aborted, were threatening to abort, or did so soon

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TABLE 2 —Obstetrical Performance Before and After Classification Regardless of Therapy

	Abortion Number	Abortion Per Cent	Immature Number	Immature Per Cent	Premature Number	Premature Per Cent	Full-Term Number	Full-Term Per Cent	Total
Primary abortion									
Before	369	100	0		0		0		369
After	142	47 3	14		9		135	45 0	300
Total (Uncorrected) Performance	511	76 5	14	2 1	9	1 3	135	20 1	669
Secondary abortion									
Before	295	62 3	0		9		169	35 7	473
After	95	46 1	3		8		100	48 5	206
Total (Uncorrected) Performance	390	57 4	3	0 5	17	2 5	269	39 6	679

after placing themselves under a physician's care This is the control group

Type II Therapy —There were 50 primary and 41 secondary abortion pregnancies to be considered They were treated with bed rest, sedation, vitamin E, progesterone, and occasionally arsenicals on a specific or even empiric basis This represents the former type of therapy

Type III Therapy —There were 41 primary and seven secondary abortion pregnancies who received this treatment, also known as the current therapy It is based on a rational approach having detection and correction of all factors, defects, and deficiencies as objectives It consisted of nutritional guidance, dietary supplements with vitamins C, K and minerals, thyroid extract when the basal metabolic rate was low, and psychotherapy These patients were not confined to bed, sedation was not employed, but coitus was restricted throughout the entire pregnancy Some patients received vitamin E and progesterone, but these items are no longer a part of the present therapy

The obstetric outcome following the three types of treatment outlined above can be obtained from Table 3 The reduction of the abortion rate from 65 per cent in the control group to 14 per cent in patients receiving Type III treatment is most impressive, since it also indicates a corresponding increase in the full term infant salvage from 26 to 80 per cent in the primary group With this regimen, 100 per cent of the secondary abortion patients went to term

Obstetric Delivery and Vital Statistics

Spontaneous vaginal delivery occurred in most of the patients although cesarean section was resorted to more frequently in the primary group of patients Normal delivery occurred in 68 per cent of the primary group and in 88 per cent of the secondary group

Congenital anomalies were present in only four infants, which is less than the clinic incidence Therefore, there is no need to advise these patients not to attempt further pregnancies

Three maternal deaths occurred following operative delivery The infantile mortality was the same as the clinic incidence in the primary group (3 per cent), but it was considerably higher, namely, 12 per cent, in the secondary group While this group has a better prognosis as to full term delivery as shown in Table 2, this advantage is partially offset by the higher infantile mortality The secondary habitual abortion patients require the same skill and care in their management as the primary group

Comment

There is no general unanimity regarding the definition of habitual abortion, nor is there any agreement as to the type of treatment Therefore, a voluminous literature on the subject has been passed by Most investigators advocate this and that form of treatment, and nearly all of them yield favorable results The large number of different regimens indicates that none are entirely satisfactory Yet, they are indicative of an

TABLE 3 —Obstetric Outcome Following Various Types of Treatment Compared with Control

Type	Therapy	Number of Pregnancies	Abortion Number	Abortion Per Cent	Immature Number	Immature Per Cent	Premature Number	Premature Per Cent	Full-Term Number	Full-Term Per Cent
Primary abortion										
I	None (Control)	189	123	65	10	5	6	3	50	26
II	Former	50	13		4		1		32	64
III	Present	41	6	14	0		2		33	80
Total		280								
Secondary abortion										
I	None (Control)	161	75	46	2	1	7	4	77	48
II	Former	41	19	46	1		1		20	48
III	Present	7	0		0		0		7	100
Total		209								

important situation namely, that multiple factors defects, and deficiencies must be considered This study has revealed multiple conditions in both the primary and secondary habitual abortion patients It has also disclosed that detection and correction of these conditions implies the use of many agents and methods in the same patient as a rational form of treatment Unfortunately, it cannot be stated from this study which vitamin, hormone, mineral, or method was responsible for the satisfactory outcome. However, some progress has been made in that direction by eliminating progesterone in 20 patients, 19 of whom had a premature or full term delivery Likewise vitamin E has been withheld in 13 patients, 11 of whom went to term Thus far, vitamin K has been omitted from the treatment of 11 patients, and ten went to term. However, sufficient time has not elapsed to form a definite opinion

Many of these patients were psychologically disturbed Perhaps medication served as a placebo, even though it also corrected a specific deficiency For the present, the pathogenesis of habitual abortion must be regarded as unsolved However, the anti hemorrhagic vitamins C and perhaps K may play an important role Deficiency in these vitamins may precipitate decidual bleeding leading to premature separation of the placenta (threatened abortion) which has a high incidence in habitual abortion patients Other evidence of hemorrhagic diathesis is manifested by nasal gingival, anal and dermal bleeding and was observed frequently in these patients

Summary

Primary habitual abortion designates the obstetric problem of patients who have had three or more consecutive spontaneous abortions in the first three pregnancies Secondary habitual abortion indicates those patients who have had three or more consecutive abortions after one or more immature premature or full term infants. An abortion is defined as the termination of pregnancy at twenty two weeks or less with the fetus weighing 500 Gm or less

The incidence of primary habitual abortion is 1 in 300 and 1 in 493 for the secondary type There were 123 patients in the primary group who had 669 pregnancies, and 88 secondary abortion patients who had 679 pregnancies, a total of 1 348 for statistical analysis

Present rational treatment aims at the detection and correction of all factors, defects and deficiencies found in a given patient. Such a program reduced the abortion rate from 65 to 14 per cent with a corresponding increase in the full term salvage from 28 to 80 per cent in patients with primary habitual abortion Similar results were obtained in the secondary group of patients

Current treatment consists of nutritional instructions, dietary supplements including vitamins C and K and minerals psychotherapy, prohibition of mineral oil, use of thyroid extract when the basal metabolic rate is low, interdiction of intercourse during the entire pregnancy, and removal of all gynecologic defects Sometimes treatment was begun before conception Elimination of vitamin E and K and progesterone has produced no noticeable reduction in full term salvage Gradual elimination of various agents, methods, and forms of treatment may provide a clue as to the pathogenesis of habitual abortion

Discussion

E C. Hughes, M D, *Syracuse*—Although we have not divided these patients into the primary and secondary groups, it is our opinion that a patient must have had at least three spontaneous abortions to be placed in such a category In any event, these unfortunate individuals present a definite clinical entity and deserve careful study in order to guarantee them a family They also give us a splendid opportunity to investigate the many and varied opinions expressed as to causes

There is no question but that obstetric complications, as stated by Dr Javert, are more prone to occur There seems to be a special triad of developments that occur sterility abortion, and premature labor or malformation with a higher incidence of toxemia and placenta previa thrown in for good measure Dr Javert s statement that the detection and correction of all gynecologic pathology forms an important part in the treatment cannot be underestimated However there is still a group that, although all gynecologic pathology has been corrected, are not able to carry a fetus to viability or term I have been particularly interested in this group

I think that Dr Javert is to be congratulated upon the excellent results, particularly in the Type III group An increase in the full-term infant salvage to 80 per cent in the primary group and 100 per cent in the secondary group seems outstanding It must be noted, however that there were only seven cases in the latter group. I do not understand to what group the four congenital anomalies, the three maternal deaths, and 12 per cent infant mortality are related as recorded in the vital statistics.

In attempting to analyze these excellent results several thoughts come to mind After correcting all gynecologic abnormalities, the treatment consists of nutritional guidance, dietary supplement with vitamins C and K and minerals, psychotherapy and restriction of coitus. Later in the paper he states that the elimination of progesterone, vitamin E, and vitamin K have offered almost as good results. This limits the treatment to the use of vitamin C almost entirely Could this therapy have an effect upon the germ cells and maternal organism whose defects obviously are the main causes of such a condition? Hertig states that in 50 per cent or more of these cases, there exists some abnormality in

the sperm Others have postulated that the maternal environment, particularly the endometrium, is deficient in the nutrients used as food by the growing blastocyst

It has been my feeling that the endometrium is at fault in the greater percentage of these women To further strengthen Dr Javert's opinion that all factors, defects, and deficiencies should be corrected, I would like to add to his discussion some observations which we have made

We have demonstrated that certain nutritional materials are deficient or absent in the endometrium of these persons Although the endometrium is probably lacking in many substances, we have found that it is particularly low in glycogen and an enzyme which splits glycogen In the normal patient, the metabolism of glycogen seems to follow a certain pattern It is metabolized by dehydration from glucose during the follicular phase in the cells of the glandular epithelium. The epithelial cells under progesterone influence release the glycogen onto the endometrial surface where it is hydrolyzed by enzymolic action to a reducing sugar The enzyme in the normal individual increases in amount during the progesterone period

This sequence of events does not take place in the patients giving a history of recurrent abortion and sterility The average enzyme output averaged 15 5 mg per Gm of endometrium in a group of aborters, and the glycogen itself was either deficient in amount or lacking entirely Patients that have presented this endometrial picture after several abortions have occurred and who, at a later date, conceived and then aborted, have demonstrated that the growth of the trophoblast itself is very abnormal This is demonstrated by pathologic study of these abortuses In most cases, the embryo itself is not formed or is malformed

The chorionic villi in most cases are hydropic or degenerated, and there is hemorrhage into the decidua These pathologic defects are reflected in the levels of chorion gonadotropin in these patients The material supposedly secreted by the Langhan's cell of the villi is not produced in adequate quantities because of failure of these cells to develop This lack of chorion gonadotropin results in the failure of the endometrium to produce materials for ovular nourishment When this occurs, as it does in most cases of habitual aborters, it is essential to prepare these patients, after adequate study, before pregnancy by giving them something which will stimulate the endometrium to secrete these essential materials

Perhaps vitamin C, as used by Dr Javert, may play a role in this stimulation We have used small amounts of estrogen, $^1/_{10}$ mg $\times$ 12, followed by large doses of progesterone one or two months before conception is allowed

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TOPICAL ANESTHESIA

FRANK C. COMBES, M.D., New York City, and ROSE B SAPERSTEIN, Los Angeles, California

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MUCH has been written of local anesthetics administered percutaneously, but little work has been done on topical anesthetics in relation to their action on the broken and intact skin for the relief of pain and pruritus [1-6] It is the latter type of preparation which is the subject of this paper *

Most surface anesthetics are employed to combat pruritus but are rarely used for the relief of cutaneous pain as experienced in ulcers fissures burns, abrasions, excoriations etc The chemicals usually employed include the phenolic and alcoholic esters, namely, menthol, thymol, phenol, benzyl alcohol, and salicyl alcohol (salgenin) [7]

In 1890, Ritsert first employed the alkyl p-aminobenzoates as topical anesthetics using the ethyl ester which was marketed as "anesthesin" and "parathesin" and is now known as "benzocaine." [8] This is the prototype of the more recently synthesized anesthetics derived from the esters of p-aminobenzoic acid which have almost completely supplanted cocaine. In 1897, Einhorn and Heinz introduced "orthoform" (later called "orthocaine"), the methyl ester of p-aminobenzoic acid [9] This compound enjoyed only a brief period of popularity since disagreeable side-effects were many and occasionally severe. Today it appears officially only in the British Pharmacopoeia. It was originally thought that orthoform was actively antiseptic, but this is probably due to its decomposition by ulcerated surfaces with release of basic salts of benzoic acid Noorden in 1902, proved that anesthesin was superior to orthoform and relatively free of any serious side-effects [6]

In general, the alkyl esters of p-aminobenzoic acid are insoluble in water, which fact limits their field of usefulness in some respects However, they are freely soluble in alcohol chloroform, ether, and up to 3 per cent soluble in vegetable fats. They are incompatible with acids and acid salts.

Alkyl aminobenzoates are valuable ingredients of dusting powders. Ten to twenty per cent is especially useful in burns, ulcers, toxic bullous dermatoses, and pemphigus Emulsions (2 to 10 per cent) have been prepared by suspending ethyl aminobenzoate in water by means of resins mastic, or acacia.[3] Not infrequently these emulsions are highly effective as surface anesthetics Because of their solubility in fats, the alkyl esters lend themselves best to use in ointments and cerates [10] The ethyl ester (benzocaine) is the active ingredient in over 90 per cent of proprietary anesthetic and antipruritic ointments in this country varying from 1 to 10 per cent by weight Its solubility in ether (1 4) makes possible its prescription in flexible collodion, an excellent remedy for insect bites, especially those due to chiggers bed bugs, etc.[11]

One feature of ethyl aminobenzoate which militates against its topical use to relieve pain and pruritus is its faculty for sensitizing the individual especially when used in concentrations ranging from 3 to 10 per cent which are necessary in order for it to be therapeutically effective. Many instances of the eczematous type of dermatitis are reported in the literature In an essay on contact dermatitis due to chemicals, Sulzberger and Wise showed that concentrated solutions are more potent sensitizers than those applied in dilution.[12] Adams studied the alkyl aminobenzoates to determine their anesthetic potency and toxicity and concluded that (1) the anesthetic effect is increased with the increase in length of the carbon chain of the alkyl group, (2) the isomeric compounds are least toxic of all, and (3) the solubility decreases with each increase in molecular weight [13]

The authors in a previous report reviewed the treatment of burns and painful ulcers with an ointment containing only 0 9 per cent of the p-aminobenzoates (ethyl 0.2 per cent amyl 0 7 per cent) [14] Anesthesia was obtained by using the longer alkyl group ester (amyl) combined with a very low concentration (0.2 per cent) of the short chain ester (ethyl) This combination of aminobenzoate esters apparently affords a synergistic effect and provides for topical anesthesia while maintaining, in most instances, a concentration below the sensitizing threshold. This local anesthesia favored the restorative process and epidermization with only an occasional instance of minor irritation. The close biologic relationship between the sensations of pain, pruritus and tickle prompted use of the same ointment in other cutaneous lesions in which itching was a prominent feature.

* An ointment of the lipophilic type was used in this investigation; its percentage composition in a lipophilic base was as follows: amyl para-aminobenzoate 0 7; ethyl para-aminobenzoate 0.2; sodium propionate, 2.0; and cod liver oil 20.0 This product was supplied by Chatham Pharmaceuticals, Inc., of Newark, New Jersey and corresponds to their product, Ultracain Ointment.

TABLE 1.—RESULTS OF TOPICAL ANESTHESIA IN 105 PATIENTS

	Number of Patients	Relieved	Not Relieved	Per cent Relieved
Pruritic Dermatoses				
Pruritus ani	19	17	2	89
Pruritus scroti	2	0	2	0
Pruritus vulvae	10	6	4	60
Anogenital pruritus	5	4	1	80
Lichen simplex	6	1	5	17
Essential pruritus	4	2	2	50
Infectious eczematoid dermatitis	6	5	1	83
Pruritic psoriasis	3	3	0	100
Dermatitis herpetiformis	1	1	0	100
Pruritus gestationis	1	0	1	0
Seborrheic dermatitis	1	1	0	100
Urticaria pigmentosa	1	0	1	0
Urticaria	2	0	2	0
Painful Dermatoses				
Denuded pemphigus	3	2	1	66
Erythema nodosum	3	0	3	0
Perianal fissures	10	10	0	100
Vulval fissures	3	2	1	66
Aphthous stomatitis	3	3	0	100
Varicose ulcer	22	20	2	91

One hundred five patients with anogenital pruritus and miscellaneous dermatoses which were pruritic or painful were treated by topical application of the ointment as often as required The results are shown in Table 1

Comments

In reviewing the literature which deals with the para-aminobenzoates, it is apparent that the properties of anesthesia, toxicity, and solubility are dependent on molecular weight The long chain ester (amyl) has greater anesthetic property, less solubility, and little toxicity The short chain ester (ethyl) has great solubility, greater toxicity, but less anesthetic ability The combination of both esters in the preparation used in this study was to enable the rapid anesthesia by the ethyl ester and more effective and more prolonged anesthesia of the amyl ester

Four patients developed a dermatitis while using the ointment, three of these had used it for anogenital dermatitis, the other for a varicose ulcer Patch tests on these patients were negative, except in one man with perianal dermatitis who had previously experienced a dermatitis from benzocaine

The relief that patients obtained from the pain of anal fissures, erosions, ruptured bullae, etc was remarkable and gratifying In those with spastic rectal constipation due to fissures, results were excellent and superior to anything previously used One woman, who had previously been tattooed with mercuric sulfide for pruritus ani with no relief, obtained immediate benefit A physician who was the victim of perianal dermatitis from anal paresis following hemiplegia has been using the ointment for over a year with complete freedom from discomfort

Patients complaining of itching associated with lichen simplex, circumscribed neurodermatitis, essential pruritus, pruritus scroti and gestationis reported only slight relief from this cutaneous sensation Apparently, more effective cutaneous anesthesia is obtained where the epidermis is not intact which is probably due to a more rapid absorption of the anesthetic agent to the local nerve-ending sites through the broken epidermis, permitting a higher concentration in a shorter period of time No relief from the pain and tenderness of erythema nodosum was experienced

The most remarkable benefits were obtained in painful varicose ulcers This has been previously reported, especially as regards acceleration in the healing rate [14] The healing properties of the cod liver oil and bacteriostatic and fungistatic properties of sodium propionate were discussed in a previous paper dealing with the treatment of varicose ulcers and burns [14] This accelerated healing rate was also evident in fissured dermatitis, especially anogenital eczema The ability of cod liver oil to facilitate epidermization is well known and is apparently independent of its vitamin A and D content

Conclusions

The apparent synergism of ethyl-aminobenzoate and amyl-aminobenzoate makes it possible to use them as surface anesthetics for the relief of pruritus and pain in an ointment of the fatty type in less than 1 per cent by weight (ethyl aminobenzoate 0 2 per cent, amyl aminobenzoate 0 7 per cent) Because of this low concentration there is little tendency to hyperallergization, even after extended and constant use

References

1 Beutner R Anesth & Analg 22 121 (May-June) 1943
2 *Ibid* 22 205 (July-Aug) 1943
3 Bolbing E and Wajda I J Pharmacol & Exper Therap 85 78 (Sept) 1945
4 Hulpieu, H R Kitchel J H and Weatherby J H *ibid* 68 395 (Mar) 1940
5 McGuigan H Cohen S J and Heinekamp W J R. J Lab & Clin Med 11 173 (Nov) 1925
6 Whitacre F M Anesth & Analg 18 112 (Mar-Apr) 1939
7 Adriani, J South Med & Surg 39 143 (Feb) 1946
8 Boderdorf K Deutsche Apothek. Ztg 49 1042 (Dec 15) 1934
9 Beutner R and Beutner K R Proc Soc Exper Biol & Med 45 337 (Oct) 1940
10 Goodman L and Gilman A Pharmacological Basis of Therapeutics New York Macmillan Co 1941 p 303
11 Sutton R J Jr J A M A., *120 26 (Sept 5)* 1942
12 Sulzberger M B and Wise, F Arch Dermat & Syph. 28 461 (Oct) 1933
13 Adams R Rideal, E K. Burnett, W B, Jenkins R. L and Dreger E E J Am. Chem. Soc 48 1758 (June) 1926
14 Combes F C Reschke M and Saperstein R B Am J Surg 74 45 (July) 1947

THE MANAGEMENT OF THE PROBLEMS ASSOCIATED WITH PROLONGED LABOR

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PATIENTS who experience prolonged labor are subject to all the hazards associated with difficult labor and delivery These patients may be as disturbing as any encountered in obstetric practice It can be granted that desultory labor may be associated with abnormalities of the pelvis or influenced by the presentation and position of the fetus, but, not infrequently there is no understandable reason for lack of adequate progress in labor It is this uncertainty regarding the ability of the uterus to perform in a normal manner during parturition that makes every parturient a possible candidate for labor dystocia

Definition and Incidence

In attempting to establish the incidence of this syndrome in a clinic or hospital, it is necessary to define what constitutes prolonged labor in that particular institution. Both definition and method of treatment employed influence the frequency of this condition. Some clinics report an incidence as high as 10 per cent, others as low as 2 per cent. The average is about 4 to 5 per cent of all labors.

It is generally accepted that eighteen to twenty hours is the extreme length of normal labor in a primigravid patient. Therefore it seems reasonable that any labor which is over twenty to twenty four hours in length should be considered a case of prolonged labor In reviewing hospital records one is immediately impressed that the onset of labor is usually entered as the time when the patient experiences painful and frequent uterine contractions The presence of painful uterine contractions is not enough to establish the diagnosis of labor These contractions must be of such quality as to produce definite changes in the condition of the cervix, exemplified either by effacement or dilation If this definition is not adhered to strictly, the true incidence of this syndrome will not be accurate.

Treatment instituted for patients who appear to be candidates for prolonged labor will have an effect on the incidence of its occurrence If one believes that these patients, whose powers of labor are insufficient to dilate the cervix readily will eventually do so if subjected to enough hours of labor and treats the patient on that premise, naturally the incidence of these cases will be high In contrast if one believes that the welfare of both mother and infant can be severely jeopardized by such extreme lengths of labor and that active measures should be instituted to improve labor and, hence effect delivery after a shorter time, there will be a further reduction in its frequency

Etiology

There being no known specific cause for the onset of labor, it follows that the etiology of this syndrome is obscure Many contributing factors have been considered. In general, they may be divided into two categories namely, factors associated with uterine motility and those concerned with the inability of the cervix to dilate So little is known regarding the physiology of parturition that it behooves one not to become too dogmatic as to which of these categories plays the more dominant role

Causative factors arising from possible faulty uterine motility are as follows (1) abnormal development of the uterus, (2) overdistention of the uterus associated with multiple pregnancy and hydramnios, (3) rapidly succeeding pregnancies with overdistention of the uterus, (4) multiple fibromyomata of the uterus, and (5) miscellaneous factors such as debilitating disease, fear of labor elderly primiparas, abnormal presentation of the fetus and pendulous abdomen with redundancy of the uterus There is no doubt that these factors do play a role in ineffectual labor, but in the majority of patients none of these is present.

Although our knowledge of the physiology of uterine motility is meager, certain observations have been made which may have some bearing on the treatment of prolonged labor It is generally accepted that the early refractional state of the uterus during pregnancy is due to the effect of progestin The activity and increased reactivity of the uterus near term have been attributed to the action of estrin. Alteration of the physiologic activity of the placenta no doubt provides hormone changes necessary to precipitate labor These hormone changes must be values which are peculiar to the onset of normal labor, for we receive the impression that patients who are definitely postmature

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more frequently have ineffectual labor This suggests that the hormone values in these latter patients are not properly balanced as in normal term labor, perhaps due to marked aging of the placenta

In addition to the hormone effects, the uterus is influenced by mineral metabolism There is improved uterine motility when there is an increase in available ionizable calcium or a decrease of normal potassium values Undoubtedly, the mineral metabolism is altered by shifts in hormone values

Considerable attention has been given to ascertaining the types of uterine contractions associated with both effectual and ineffectual labor Murphy, using a Lorand tocograph, has shown that uterine inertia is associated with contractions (*a*) of small magnitude, (*b*) of considerable arrythmicity, (*c*) which fail to resemble each other in magnitude and general character, and (*d*) where even a high tonus of the uterus does not increase the strength of the uterine contractions [1] By a precise method, Murphy has substantiated the clinical observation that ineffectual labor is associated with poor uterine contractility

The role which the cervix plays in the production of this syndrome has always been considered of secondary importance and so-called cervical dystocia has been thought to be a rare occurrence However, spontaneous and complete amputation of the cervix without dilation of the os does occur in labor in the presence of normal cephalopelvic relationship Certainly, these are bona fide causes of cervical dystocia The cervix may be more involved in the production of this syndrome than has been previously attributed to that portion of the uterus Recent publications by Danforth and Schwartz have added to our knowledge regarding the formation and behavior of the lower uterine segment and cervix during pregnancy and labor [2,3] Danforth has re-emphasized that the isthmic portion of the uterus should be considered a part of the corpus and that, as more space is required by the ovum, it unfolds to form the lower uterine segment Moreover, this author has presented further evidence that there is considerable variation in the amount of fibrous and muscular tissue contained in the cervix A marked preponderance of the former has been verified by Schwartz It then appears that dilation of the cervix is principally one of stretching this fibrous tissue, and there is in no sense any sphincter-like muscular action Possible differences in this composition of the cervix allow for a certain degree of speculation regarding its inconstant behavior during labor

Prolonged labor is restricted, with few exceptions, to primiparous patients Although such patients may ofttimes have a difficult pelvic delivery, subsequent labors will at least not be complicated by cervical dystocia Even a patient whose delivery has been performed through a partially dilated cervix with the aid of Dührssen's incision will dilate without difficulty in a following pregnancy This suggests that perhaps on occasion the ratio of muscle to fibrous tissue in the cervix is reversed and a sphincter-like action may be present For dilation to occur, the sphincter would have to relax with contractions of the corpus This is comparable to other organs containing a sphincter This being a possibility, there may be an upset in the neuromuscular mechanism in which the sphincter does not relax as the corpus of the uterus contracts Overcoming this sphincter-like action by disruption of the cervical tissue during labor could well facilitate labor in subsequent delivery, provided that in the puerperium there is proper healing with a minimum of scar tissue formation.

Management and Treatment

Prior to consideration of the management of patients with prolonged labor, certain basic principles should be established The problem of the contracted pelvis or large or abnormal presentation of the fetus is one of fetal-pelvic relationship Any lack of cervical dilation which often accompanies such cases is an incidental factor in obstructing progress in labor In the presence of definite fetal-pelvic disproportion, the patient, if properly managed, should not be subjected to a prolonged labor In contrast, if this relationship is so-called "borderline," the success of pelvic delivery will depend largely on the character and quality of the labor and the ability of the cervix to dilate This is true, in large measure, in patients with a normal fetal-pelvic relationship in whom there is breech presentation or nonrotation of the occiput

Maternal risk involved is not great, provided the case is carefully evaluated and properly managed This presupposes that, if operative intervention becomes necessary, this will be done at the proper time and in the correct manner The patient can be supported in labor indefinitely with adequate rest and if careful attention is given to control of fluid balance The risk will be further decreased if measures are taken to combat intrauterine infection

Fetal risk, by contrast, is a major factor in the management of these patients Fetal mortality is definitely increased at the onset of prolonged labor and increases materially when labor becomes markedly protracted [4,5] That this fetal risk is present in every labor is suggested by the fact that even in normal term labor and delivery,

where the fetus is normal, an occasional baby is lost where there is no demonstrable cause for death Autopsy findings are those associated with intrauterine asphyxia which is evidence that even in normal labor there is some degree of fetal anoxia. In prolonged labor this process is considerably exaggerated. Although we have observed a gratifying reduction in infant deaths from intracranial hemorrhage, there has been no such reduction in deaths from asphyxia. Furthermore, it must be emphasized that fetal damage caused by intrauterine anoxia is not completely reflected in the stillbirth rate alone, but the remote effects are those of severe and permanent brain injury The following table will indicate trends in these two major causes of fetal death during labor

dicated at this time, for one is unable to predict which patients are predestined to have prolonged labor Adequate fluids, preferably given intravenously to insure absorption, should be administered periodically Food and fluids when given by mouth during labor are not adequately absorbed and may give rise to vomiting with the risk of asphyxia pneumonitis from the aspiration of this irritating vomitus The urinary bladder must be carefully observed with catheterization resorted to on occasion if the patient is unable to void

With the increase of the hours of labor the degree of cervical dilation, the absolute cephalopelvic relationship, particularly with respect to the mid and lower pelvic plane, the state of the fetal membranes, and the condition of the fetus all

TABLE I.—FETAL DEATHS FROM INTRACRANIAL INJURY AND ASPHYXIA AT THE BOSTON LYING-IN HOSPITAL (EXPRESSED IN THE RATE PER 1 000 BIRTHS)

	1873–1892*	1893–1902	1903–1912*	1913–1922	1923–1932	1933–1936	1937–1941	1942–1946
Intracranial injury	1 70	1 10	1 60	2 10	5 20	1 13	1 15	1 60
Asphyxia and atelectasis	2 80	3 26	2 90	3 10	1 80	2 13	3 50	4 40

* Low incidence because of many classified as Cause of Death in Doubt.

It will be noted that during the past fifteen years there has been a definite decline in deaths due to intracranial hemorrhage This, no doubt, reflects the decrease in the incidence of traumatic pelvic deliveries. It is apparent that factors producing intrauterine fetal anoxia have not decreased

It would appear that the fundamental treatment for these patients would be to permit a sufficient test of labor without producing irreversible asphyxial damage to the fetus. In the management of these patients, the definite time of the onset of labor must be established first. This, on occasion, may be quite difficult. If the patient has difficulty in initiating labor the term "primary inertia' is applied to denote this condition This appears to be a poor term, for, if the cervix has not been changed either by effacement or dilation, the patient has not been in true labor and hence cannot have inertia regardless of the type. The time which has elapsed under such circumstances should not be considered in the total length of labor Stimulation of uterine contractions by oxytocic drugs has been suggested for the treatment of this form of inertia Here the use of such drugs is not generally effective and, if administered at this time, may produce unnecessary fetal anoxia. The indicated treatment is adequate doses of opiates and intravenous fluids until true labor ensues

Once the cervix begins to change due to effective uterine contractions, we should note carefully the time of the onset of true labor Adequate medication for relief of pain is not contraindicated assume greater importance in the proper conduct of the case

On occasion it is difficult to decide the exact degree of cervical dilation in these patients if only rectal examinations are performed Many times the cervix is thought to be fully dilated even for some hours when on vaginal examination at the time when delivery is contemplated, a considerable amount of cervix is found encompassing the presenting part. Valuable as x ray pelvimetry may be a carefully conducted vaginal examination can reveal additional information with respect to whether the dimensions of the midpelvic and the pelvic outlet will allow for successful normal or low forceps delivery This is particularly true if the latter must be performed with the aid of Dührssen's incision. Furthermore, if vaginal examination is not performed on occasion, the time at which progress in labor has ceased will not be accurately determined, and, hence there may occur many hours of needless labor with its adverse effect on the baby

The state of the fetal membranes is always an important factor in these labors Frequently, the membranes are ruptured prior to the onset of labor Whenever this occurs, the use of the antibiotics has been suggested as a routine prophylactic measure. There is no doubt that this has decreased the incidence of intrauterine infection both in the mother and the fetus. However, there are pathogenic organisms which are not influenced by antibiotics. Also, one is impressed by the fact that patients treated for many days prophylactically with antibiotics for spontaneous rupture of

the membranes will, for the first time, develop fever concomitantly with the onset of labor This emphasizes the fact that, although the findings associated with intrauterine infection may not always be present, these patients must be considered as potentially infected This fact must always be weighed when selecting the delivery procedure This is particularly true in patients who must be delivered by abdominal hysterotomy

In these patients with desultory labor, where the fetal membranes are intact, the efficacy of artificial rupture to improve the labor must be considered On occasion, such a procedure is followed by excellent progress in labor Just as often no improvement is noted, and when this occurs, an increase in fetal and maternal risk is created There are certain conditions where artificial rupture of the membranes is contraindicated irrespective of the quality of the labor These conditions are present in the pelvis with a converging bore in which there are varying degrees of mid and outlet contraction Persistent occiput posterior and transverse position of the occiput are not infrequent in many of these cases Many times the vertex is deflexed, which does not allow the presenting part to fit snugly against the cervix Hence, in these patients, the forewaters will be the most effective cervical dilator

Eventually, in the conduct of labor in these individuals, a decision must be made in regard to the length of labor that is to be allowed and the steps to be taken to effect delivery As previously stated, the fetal mortality and morbidity are of greatest concern Fetal mortality (corrected for abnormalities) in full-term, normal babies ranges from 10 to 15 per cent in this syndrome This mortality is about 6 per cent in patients entering prolonged labor, i e , twenty-four hours At sixty hours or more of labor, this mortality rises abruptly Therefore, it seems reasonable that, for the best interest of the infant, at least, somewhere between thirty to forty hours from the onset of labor is the logical time for delivery In order to do this, the maximum amount of progress in labor must be obtained at the end of that time

Careful observation must be made to detect lack of progress resulting from secondary uterine inertia It must be remembered that hours of labor without progress can be as damaging to the fetus as labor with adequate progress

Until we know the physiologic cause of labor, it is unlikely that the ideal uterine stimulant for secondary inertia or functional dystocia will be available Regardless of its controversial aspects, we believe that posterior pituitary extract does offer the best therapeutic help in the treatment of these patients As we have previously stated, we have not been impressed by the dangers emanating from the drug but rather by its limitations We would restrict its use to primiparous patients with secondary uterine inertia, in whom the cephalopelvic relation is normal Fortunately, this will include most of the patients with prolonged labor

The drug is given in the thirty- to forty-hour period to overcome the presence of secondary inertia It is administered for two reasons first, to produce uterine contractions sufficient to increase the dilation of the cervix, and, second, to demonstrate over a comparatively short time whether the uterus will ever have the ability to contract sufficiently to produce this dilation

The drug is administered intramuscularly beginning in $^1/_2$- to 1-mm doses The physician in charge should make careful observations as to the degree of contraction and the relaxation of the uterus Tetanic contractions of the uterus are extremely rare, and should they occur, they usually appear with the first dose rather than with subsequent administration of the drug The drug is given again within twenty to thirty minutes if effective uterine contractions have not occurred A series of doses at such intervals, increasing in amount up to three minims for a single dose, are administered until effective uterine contractions are produced If progress in labor is re-established from the effect of the drug, the cervix should, on the average, be completely dilated in the ensuing three to four hours from the time of the initial dose Pelvic delivery can then be accomplished either by low forceps or normally However, if appreciable progress has not been accomplished at the end of that time, additional dosage of the drug will be unlikely to produce progress Actually, continuation of such therapy may produce an unneccessary degree of intrauterine asphyxia Should a trial of pituitary extract fail to produce progress during the critical thirty-to forty-hour period of prolonged labor, further procrastination regarding delivery will only increase the incidence of irreversible anoxial damage to the fetus Delivery should then be performed in the least traumatic manner

The decision regarding the type of delivery depends upon two factors namely, the degree of cervical dilation and the station of the presenting part If the cervix is more than half dilated, the presenting part nearing the pelvic floor, and the outlet ample, pelvic delivery, with the aid of Dührssen's incision if necessary, should be performed If these conditions are not fulfilled, abdominal hysterotomy is probably a less traumatic and safer procedure

The method of treatment of potentially infected cases of prolonged labor who must be delivered by abdominal hysterotomy is still a controversial subject Procedures employed range

from the generous use of the antibiotics in labor followed by transperitoneal section, to a radical cesarean section, i.e., section followed by hysterectomy. Whether the former procedure is sufficient to prevent peritoneal infection is still to be established. Certainly, there is considerable mortality associated with radical or Porro section when performed in the presence of definite uterine infection. It would seem more reasonable to employ the virtues of the antibiotics and, at the same time, use a type of operation that does not permit contamination of the peritoneum by the spill of infected uterine contents. Any of the extraperitoneal types of cesarean section can provide this added safety.

The relief of pain during these labors is not too satisfactory. As soon as there is lack of progress analgesic drugs are not given, in the hope that nothing will be done to abolish labor or to contribute to fetal anoxia. Careful choice of the terminal anesthesia is important, particularly if an operative delivery is contemplated. Again, the type of anesthesia used should not contribute to fetal anoxia.

Conclusion

The treatment of cases of prolonged labor must take cognizance of the following factors: length of labor, intrauterine infection, fetal anoxia, the need for proper analgesia and anesthesia, and the correct method of delivery.

References

1. Murphy, Douglas P.: Uterine Contractility in Pregnancy. Philadelphia, J. B. Lippincott Co., 1947.
2. Danforth, D. N.: Am. J. Obst. & Gynec. 53: 541 (1947).
3. Schwartz, O. H., and Woolf, R. B.: *ibid.* 55: 161 (1948).
4. Douglas, R. G., and Stander, H. J.: *ibid.* 46: 1 (1943).
5. Reid, Duncan E.: *ibid.* 52: 719 (1946).

THE PRESENT STATUS OF PRESERVATION OF THE ANAL SPHINCTER IN RADICAL OPERATIONS FOR CARCINOMA OF THE RECTUM AND RECTOSIGMOID

A. O. Wilensky, M.D., New York City

THERE is continuous renewed interest in the possibility of preserving the sphincter ani in the radical removal of carcinomata of the rectum and rectosigmoid.* Unfortunately the issue of sphincter preservation has been confused with, and clinical interest has been diverted to and more or less concentrated upon accomplishing this purpose through the abdominal route alone—the so-called anterior resection. This is perhaps, deplorable because the point at issue is not which route is employed for accomplishing this highly laudable purpose but the preservation of the sphincter or the restoration of a sphincter function, preferably the former.

With the older methods, practically all of the attempts were based upon some form of plastic procedure in which a more or less new anatomic structure was made, by which it was hoped that a new sphincteric action could be accomplished. This usually failed primarily because of infection and technical difficulties.

Nowadays, the possibility of preserving the sphincter is, in the last analysis, entirely dependent upon the physical situation of the growth with respect to the anus. When the lower margin of the growth is at least 3 inches from the anus, it is technically feasible to remove the malignancy radically and to preserve the sphincter no matter what path of approach—abdominal, posterior and/or combined—is employed. With modern methods and technic a one-stage straightforward resection of the tumor bearing segment with immediate end-to-end two- or three-layer circular suture seems, by all accounts and according to my own experience, to be the best method of operation in nonobstructive cases and is much superior to the pull-through and other plastic methods of restoration of the sphincter function. There is no doubt that the success which has followed the new methods of operation with preservation of the sphincter has been vastly increased by the availability of antibiotics and chemotherapy. The present tendency is to do all of this

* It is most regrettable that in comparing the various publications on this all-important subject, there should be difficulty because of confusion in the usage of anatomic terms in differentiating the various segments of the terminal part of the left half of the large intestine and because of any obscurity in the descriptions of the various operative procedures and their connotations as regards the preservation of the normal sphincter or the substitutional restoration of a sphincteric function by a form of plastic operation.

in one stage in the nonobstructive cases without regard to the method of approach Except among a few groups, more and more men are doing the operation without the simultaneous performance of a colostomy This has been my own practice also

All of the criteria from which decisions must be made regarding the operability of any given case are independent of the path of approach and of the question of preserving the sphincter and remain based on the tried traditions and practice of successful surgery The exercise of this discipline has also always been my practice from the very beginning

The published statistics indicate that the resectability (operability) rate varies in various hands from 35 to 80 per cent The wide difference in these figures undoubtedly corresponds to personal factors The higher figure may also carry a certain amount of error Both of these indicate further that the procedure has not as yet been sufficiently standardized

TABLE 1 —Resectability Rates

	Total Number of Cases	Number of Operations with Sphincter Preservation	Total Resectability Rate—All Cases Per Cent	Resectability Rate with Sphincter Preservation Per Cent
Mandl[1,2]	461	227		49+
Bacon[3]	208	167		80 3
Wilensky[4–6]	83	15	83	35

The literature indicates that with preservation of the sphincter the average mortality rates vary from a low of 3 4 per cent (Dixon—recent figures) to a high of 8 9 per cent (Coller and Ransom) [7 8] Other series show mortalities from 12 to 21 per cent (Table 2) The literature indicates that with preservation of the sphincter, the average mortality rate is not any higher than when the latter is sacrificed, and, remarkably, it is noted that frequently the mortality is less [1]

TABLE 2 —Mortality Rates

	Number of Cases	Per Cent Mortality
Fallis[9]	31	6 5
Waugh and Custer[10]		6 3
Coller and Ransom[8]		8 9
Fansler[11]		5 25
Babcock and Bacon[12]		6 6 (abdominoperineal)
		4 0 (perineal)
Bacon *et al* [13]		5 9
Wangensteen[14]	28	0
Dixon[7]		12 1 (up to 1944)
	41	3 4 (recent cases)
Zinninger and Hoxworth[15]	18	12+
Koch[16 17]	66	21 0
Wilensky[4–6]		11 0

The postoperative course is not unduly prolonged There are few extraordinary postoperative complications There is no difference in the frequency of any postoperative bladder dysfunction in any of the types of operative approach or in the operation itself, and, in any case, this seems to be a temporary affair only However, it is noted that in the male subject impotence follows in about one half of the cases in which the anatomic sphincter is preserved or its function restored, whereas after abdominoposterior complete removal of the rectum and its sphincter ani, impotence after operation has been reported in as high as 95 per cent of the cases

With the modern end-to-end circular suture method of preservation of the anatomic sphincter, bowel function is perfect when healing is completed In the methods of restoration and/or reconstruction of the sphincter function (pull-through operation and/or other plastic procedures), incontinence results and/or follows with more or less completeness in from 50 to 75 per cent of the cases In the past, this has undoubtedly been one of the deterrent factors for the preservation of the sphincter This information is shown in the following table

TABLE 3 —Types of Operations and Resultant Continence

	Type of Operation	Per Cent Continent	Degree of Continence
Mandl[1 2]	Circular suture	49 4	Complete
	Pull-through	64 5	Complete
Koerbl[16]	Hochenegg	36	Complete
	Kraske	66	Complete
Du Pan[19]		20	80 per cent partial
Gersuny[20]		75	Satisfactory
Bacon *et al* [13]	Constant change in technic	70–75	Variable
Wilensky[4–6]	End to-end suture	100	100 per cent

Without node involvement local recurrences occur in 4 6 per cent of the cases and with node involvement in 23 2 per cent (Gilchrist and David) [21] Without this differentiation the series of D'Allaines and Vernejoul show 17 8 per cent recurrences after resections and 25 per cent after complete proctectomy, and my own cases show an equal rate of 5 5 per cent in either case (Table 4) [22 23]

In general, as also with sphincter preservation or restoration, local recurrence of the malignancy in the operative area depends to a much lesser degree on the extent of the growth in the longitudinal axis of the bowel To a much larger degree, it depends upon the spread of the tumor cells through the thickness of the rectal wall and out into the rectal capsule and pelvic fatty areolar tissue Local spread of the latter kind is already present in from one half to two thirds of the cases at the time of operation [21] When operation is done from the abdominal route exclusively (anterior resections) and the individual case is badly selected, the rate of local recurrence is somewhat higher When there is lymph node involvement,

TABLE 4.—LOCAL RECURRENCES

	Elapsed Period Years	Number of Cases	Recurrences after Resection Per Cent	Recurrences after Proctectomy Per Cent	Survival Rate Per Cent	Survival Rate after Proctectomy Per Cent
D'Allaines and Vernejoul[27,12]			17 8	25		
Mandl[1]	3	1,000			33 37	26–31
Finsterer[4,13] (1941)	5				33 5	22 5
Wilensky (1947)[1–4]	1 2	86	5 3	5 5	75	50

the rate of local recurrence rises abruptly In any case, local recurrence occurs equally and seems independent of the method of approach and does not seem to be materially different in series of cases with or without preservation of the sphincter

The five- and ten year survival rates in the reported series of cases vary from 51 8 per cent without node involvement to 23 per cent with node involvement [21] Most of the series do not make this differentiation, and then the survival rate varies from 26 per cent to 35 per cent [4 6 12]

TABLE 5.—SURVIVAL RATES

	Observation Period, Years	Per Cent Without Nod Involvement	Per Cent with Nod Involvement	Per Cent Nodes Not Mentioned
Sauty Dargent and Michaud[24,25]	5			50
Colcock[5]	5	60	30 2	
	10	51 8	23 2	
Babcock and Becon[14]	1–3			81
	5–10			38
Mandl[1]	3			33 37
Fieslsberg, Payr Sauerbruch, Galeda and Kirschner[26]	3 (Av)			70
	5			23
Wilensky[1–4]	2			14
	3			7
	10			27
Koch[16]	2			60
	3			50

At the present writing the survival rate with sacrifice of the sphincter is superior only when there is no extramural spread of the malignancy and when the lymph nodes are not involved with tumor growth This is, of course, true with all forms of operation Otherwise the reported survival rates show a balance remarkably in favor of operation with preservation of the sphincter (Mandl series and Finsterer series approximately 30 per cent more Wilensky series about 50 per cent more) [1 22 23 4]

It seems fair to say that sphincter preservation is in its early stages of modern development The individual series of cases are still very small and do not yet approach the magnitude of earlier series of cases in which the older types of operation were practiced and in which the sphincter was routinely sacrificed It also seems fair to assume that the results of operation with sphincter preservation will continually improve with further more extended experience as have other types of operation performed under modern conditions It seems true that some of the criteria of tumor growth and spread which brought about the Miles and other similar types of radical operation with ruthless removal of the sphincter must be somewhat modified in the light of modern thought and practice [27]

References

1 Mandl F Deutsche Ztschr f Chir 219: 3 (1929)
2 *Idem.* J Internat. Coll Surgeons 3: 11 (1940)
3 Bacon, H E. Anus, Rectum and Sigmoid Colon, 1st ed. Philadelphia J B. Lippincott Co. 1938 p. 376.
4 Wilensky A O New York State J Med 42: 1150 (1942)
5. *Idem.* R y Gastroenterol 15 55 (1948)
6 *Idem.* J Internat. Coll. Surgeons 11: 73 (1948)
7 Di oo C F: Surgery 15 267 (1944)
8. Coller F A. and Ransom H K. Surg., Gynec & Obst 78 304 (1944)
9 Faille, L. S. Surgery 14: 397 (1943)
10. Waugh, J M and Custer M D Jr S rg. Gynec & Obst. 81: 505 (1945)
11 Fassler, W A: Minnesota Med. 27: 53 (1944)
12. Babcock W W and Bacon H. E.: Arch Surg. 46: 253 (1943)
13. Bacon, H E. Fleming J P Smith, C H. and Holoman M B. J Internat. Coll. Surgeons 9: 511 (1940)
14 Wangensteen, O H. Surgery 14: 403 (1943)
15 Zinninger M M. and Hoxworth, P I *Ind.* 14: 206 (1943)
16. Koch F: Acta chir Scandinav 93: 145 (1947)
17 *Idem.* Internat. Abstr Surg. 85: 38 (1947)
18. Koerbl, H.: Arch. f. klin Chir 103: 449 (1913)
19. Du Pan, M. R y de chir., Paris 34: 258 (1906)
20. Gersuny R. Wien. klin. Wehnschr 28: 710 (1878)
21 Gilchrist R. K. and David, V C.: Ann. Surg. 126: 421 (1947)
22. D'Allaines, F and Vernejo ul, R.: J de chir 62 274 (1946)
23 *Idem.* Internat Abstr Surg. 84: 554 (1947)
24. Sauty, P Dargent, M and Michaud O Lyon chir. 41: 641 (1946)
25. *Idem.* J Internat Abstr Surg. 3: 11 (1940)
26. Fassler, H. W *Chirurg.* 7: 105 (1935)
27 Miles W E. Lancet 2: 1812 (1908)

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A NEW METHOD IN THE MANAGEMENT OF ACUTE ANTERIOR POLIOMYELITIS

EMIL SMITH, M D , DAVID J GRAUBARD, M D , NORMAN GOLDSTEIN, M D , and WILLIAM BIKOFF, M D , Brooklyn, New York

(From the Communicable Disease Service, Kingston Avenue Hospital for Communicable Diseases)

ONE of the major problems in the management of acute anterior poliomyelitis is the alleviation of pain and spasm Since the recognition of this disease, many investigators have attempted to describe the pathogenesis of the symptom-complex of pain and to evolve a method for its control It is not the purpose of this preliminary report to compare procedures but to present clinical evidence as to the origin and control of pain and spasm

Kuntz states "In cases of poliomyelitis, muscular paralysis is accompanied by segmental vasomotor and sweat secretory disturbances In this disease, the inflammatory process in the spinal cord may involve the intermediolateral cell column directly, but, not infrequently, pathologic changes also occur in the corresponding ganglia of the sympathetic trunk "[1] Bodian in reviewing 24 fatal cases found the intermediolateral or sympathetic cell columns little involved, except for one case of considerable destruction [2] Many clinicians have indicated the existence of sympathetic imbalance in poliomyelitis [3 4] Smith and his coworkers have shown definite histopathologic changes in sympathetic ganglia in two fatal cases [5] They have summarized their findings as follows "Ganglion cells appeared shrunken, and nuclei were obscured or absent Some coarse basophilic granules were seen in the cytoplasm, nuclear-cytoplasmic distinction was unclear in some cells, and in others the nucleoli appeared fragmented Distinct neuronophagia in the sympathetic ganglia was not seen, leading us to the belief that the changes were probably reversible "

In a series of 46 lumbar sympathectomies, Harris and Harris and McDonald obtained good results in children with residual paralysis following anterior poliomyelitis [6 7] Hyperemia was maintained in 32 cases Accelerated rate of growth on the operated side was noted in 26 cases of the series Similar results were obtained by Telford, and White and Smithwick [8 9]

The mechanism of vasospasm can be summarized briefly as a defense mechanism of tissue response When an irritable focus is established in the periphery, the organism reacts by vasospasm and exudate. These usually subside at the time healing is completed However, if an irritative focus persists, a reflex arc producing pain and spasm is established This arc may perpetuate itself through the internuncial pool and eventually involve the sympathetic motor neuron cells in the lateral horn [10 11] As a corollary we can recognize that direct involvement not only of the lateral horn but also of the sympathetic chain can produce a similar picture

It can readily be seen that interruption of the cycle of reflexes is, therefore, the method of choice The results achieved in cases of trauma with the intravenous administration of procaine have indicated that the symptom-complex of pain may be controlled in this way [12–14]

Material

In the summer of 1948, 159 cases of acute anterior poliomyelitis were admitted to the Kingston Avenue Hospital Eighty cases were not treated by the method to be described because they were of the bulbar type, because they presented no evidence of pain or spasm, or because they showed pure anterior horn involvement. Cases of the bulbar types were excluded, since the occurrence of fatality might have been attributed erroneously to the method of treatment The remaining 79 cases were treated with intravenous infusions of procaine, by administration of Priscol, or by diethylaminoethanol * No deaths resulted in the treated group

Although this investigation was originally undertaken to determine the efficacy of procaine hydrochloride administered intravenously in cases of acute poliomyelitis, it was thought worthwhile to investigate Priscol hydrochloride (2 benzl-4,5 imidazoline hydrochloride) also, because of its known sympatholytic action and diethylaminoethanol hydrochloride because of its procaine-like action as an analgesic [5 15–18]

Dosage and Administration

During the first month of this three-month survey, therapy in all cases was instituted only after the patient's temperature returned to normal in

Presented at the Clinical Conference Kingston Avenue Hospital for Communicable Diseases Brooklyn October 7 1948

* Procaine hydrochloride used was the product "Novocain generously donated by the Department of Medical Research Winthrop-Stearns Inc Priscol hydrochloride used was generously donated by Ciba Pharmaceutical Products Inc and diethylaminoethanol hydrochloride was generously donated by the Department of Medical Research, Winthrop Stearns Inc

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CONTENTS

Index to Volume 48—Part II 2731

SCIENTIFIC ARTICLES

The Female Perineum Its Structure, Function, and Preservation, *Raymond J Peirt, M D*, and *Frank C Meyer, M D* 2693

Some Associated Eye and Skin Manifestations of Systemic Disease, *Isadore Givner, M D, F A C S* 2700

Nutritional Requirements in Convalescence, *Herbert Pollack, M D*, and *John Bookman, M D* 2706

Postoperative Iridocyclitis, *Albert C Snell, Jr, M D* 2710

Prevention of Deafness by the Elimination of Hypertrophied Lymphoid Tissue in the Nasopharynx by Radium Therapy, *J Coleman Scal, M D, F A C S* 2715

(*Continued on page 2660*)



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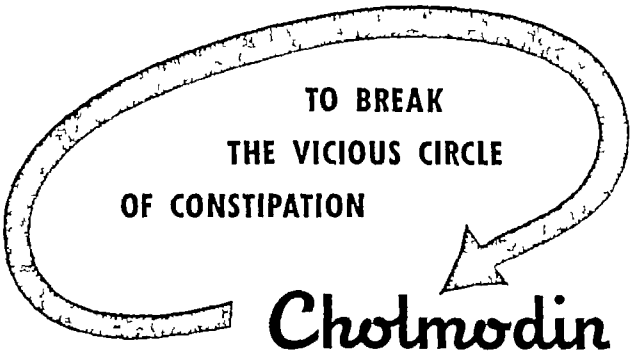
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(CONTENTS—Continued from page 2658)

The Intraperitoneal Use of Streptomycin, *Angelo A Zingaro, M D* 2718
Hydrolyzed Oral Hay Fever Antigens, *Henry M Feinblatt, M D , F A C P* , and *Edgar A Ferguson, Jr* 2720
The Fallacy of Hydrochloric Acid Interpretations in Gastric Surgery, *Edward O Finestone, M D , F A C S* 2724
Radiographic Pneumoperitoneum in Acute Perforations of the Gastrointestinal Tract, *Stanley A Kornblum, M D* 2726

SPECIAL ARTICLE

Alcoholism—A Challenge to the Medical Profession, *Milton G Potter, M D* 2729

EDITORIALS

Christmas, 1948 2687
The Moving Finger Writes 2687
Stop, Look, Listen, II 2688
Current Editorial Comment 2689
Facts About Nutrition 2691

GENERAL FEATURES

Necrology 2738
Medical News 2739
Hospital News 2742
Woman's Auxiliary 2743
Abstract of Minutes of the Council of the Medical Society of the State of New York 2745

MISCELLANEOUS

State Society Officers 2662, 2664, 2666
County Society Officers 2762

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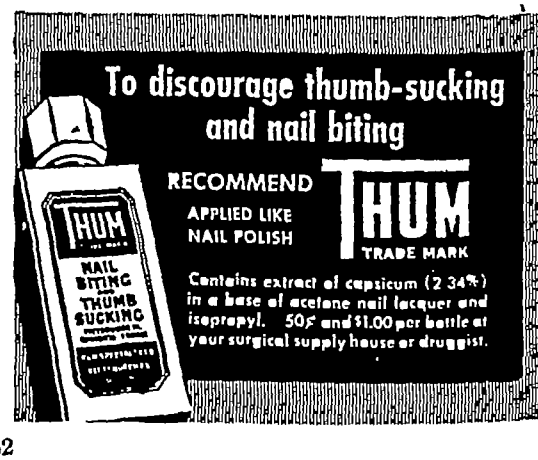
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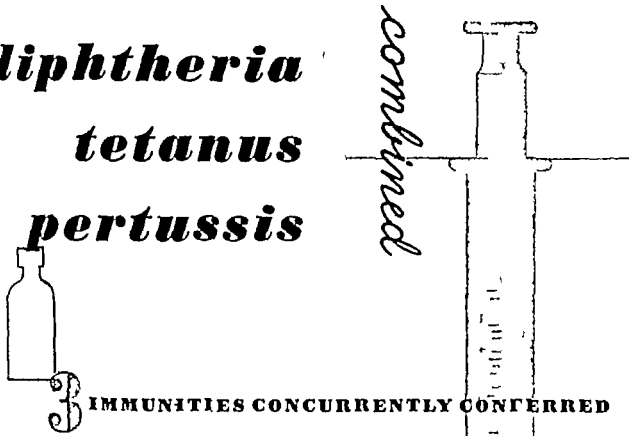
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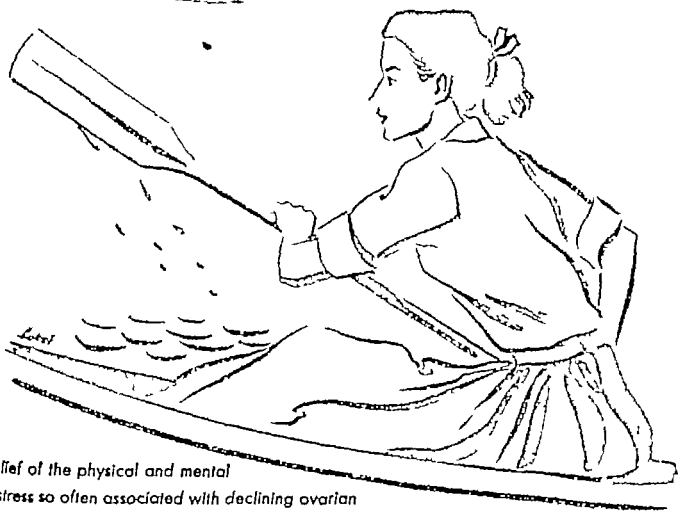
MEDICAMENTA VERA



INDEX TO ADVERTISERS

Ames Company Inc	2659
The Arlington Chemical Company	2658
Armour Laboratories	2672
Ayerst McKenna & Harrison Limited	2669
Dr Barnes Sanitarium	2759
Milton H Berry Foundation Schools	2753
Ernst Bischoff Company, Inc	2656
Borcherdt Malt Extract Company	2666
Brewer & Company Inc	2749
Brigham Hall Hospital	2757
Brunswick Home	2757
S H Camp and Company	2670
Carstairs Bros	2683
G Ceribelli & Co	2684
Ciba Pharmaceutical Products, Inc	3rd cover
Coca Cola Co	2704
Colin Pharmacal Co Inc	2668
Commercial Solvents Corporation	2685
Crane Discount Corporation	2662
The Denver Chemical Mfg Company	2678
Dome Chemicals Inc	2676
Falkirk in the Ramapos	2759
C B Fleet Co Inc	2677
Flint Eaton & Co	2664
Fried & Kohler, Inc	2655
Halcyon Rest	2757
Hall-Brooke	2757
J E Hanger	2678
Harmon Chemicals Inc.	2684
Hill Top Sanitarium	2757
Holbrook Manor	2759
Homemakers Products Corporation	2759
Interpines	2759
Lakeside Laboratories Inc	2671
Eli Lilly and Company	2686
Louden-Knickerbocker Hall Inc	2757
M & R Dietetic Laboratories Inc	2682
Mandl School	2753
The Maples Inc	2757
The S E Massengill Company	2763
Mead Johnson & Co	4th cover
Medico Press	2755
Merck & Co Inc	2674
The Wm S Merrell Company	2nd cover
New York Medical Exchange	2757
Novocol Chemical Mfg Co Inc	2751
Num Specialty Co	2662
Parke Davis & Company	2667
The E L Patch Company	2684
R. J Reynolds Tobacco Company	2657
Wm. S Rice Inc	2676
Sandoz Chemical Works Inc	2660
Saratoga Springs Authority	2680
Schenley Laboratories Inc	2673
Schering Corporation	2665
Julius Schmid Inc	2761
G D Searle & Co	2663
E R Squibb & Sons	2679
Standard Pharmaceutical Co Inc	2757
Teca Corporation	2753
Charles B Towns Hospital	2759
Twin Elms	2759
Van Patten Pharmaceutical Co	2678
West Hill	2759
Westwood Pharmacal Corp	2675
Whitbread & Co Ltd	2751
Winthrop-Stearns Inc	2661
Wyeth Incorporated	2681

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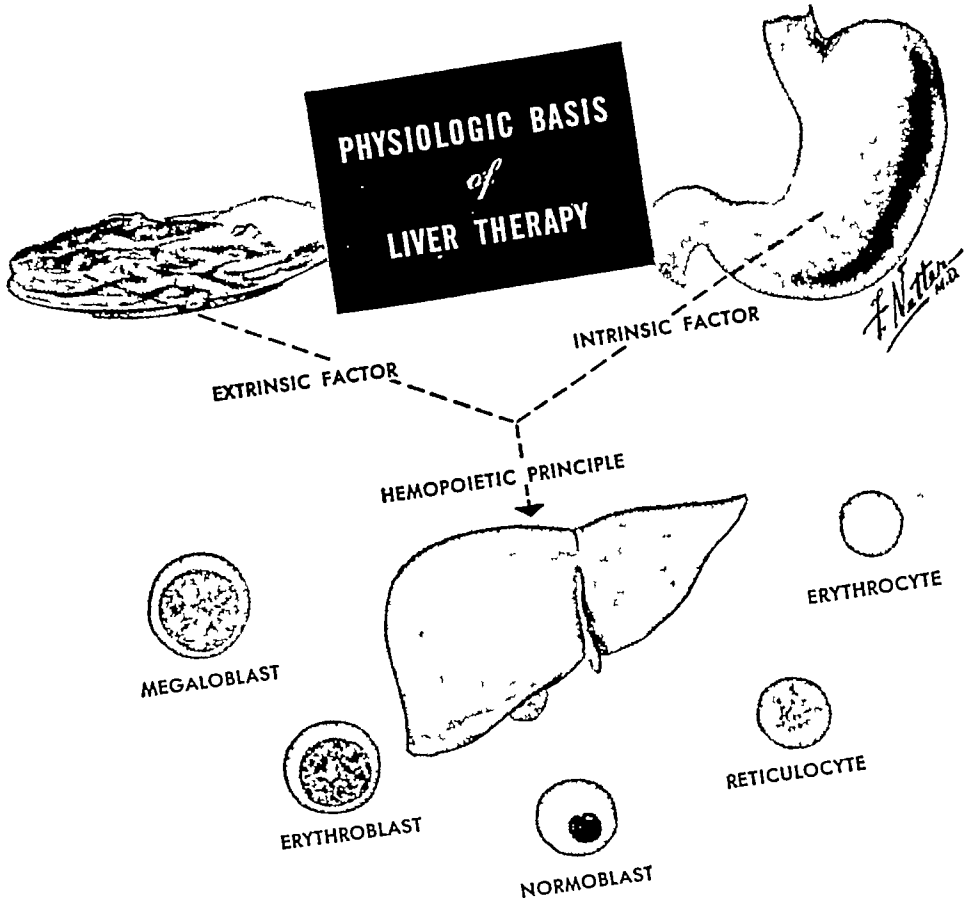
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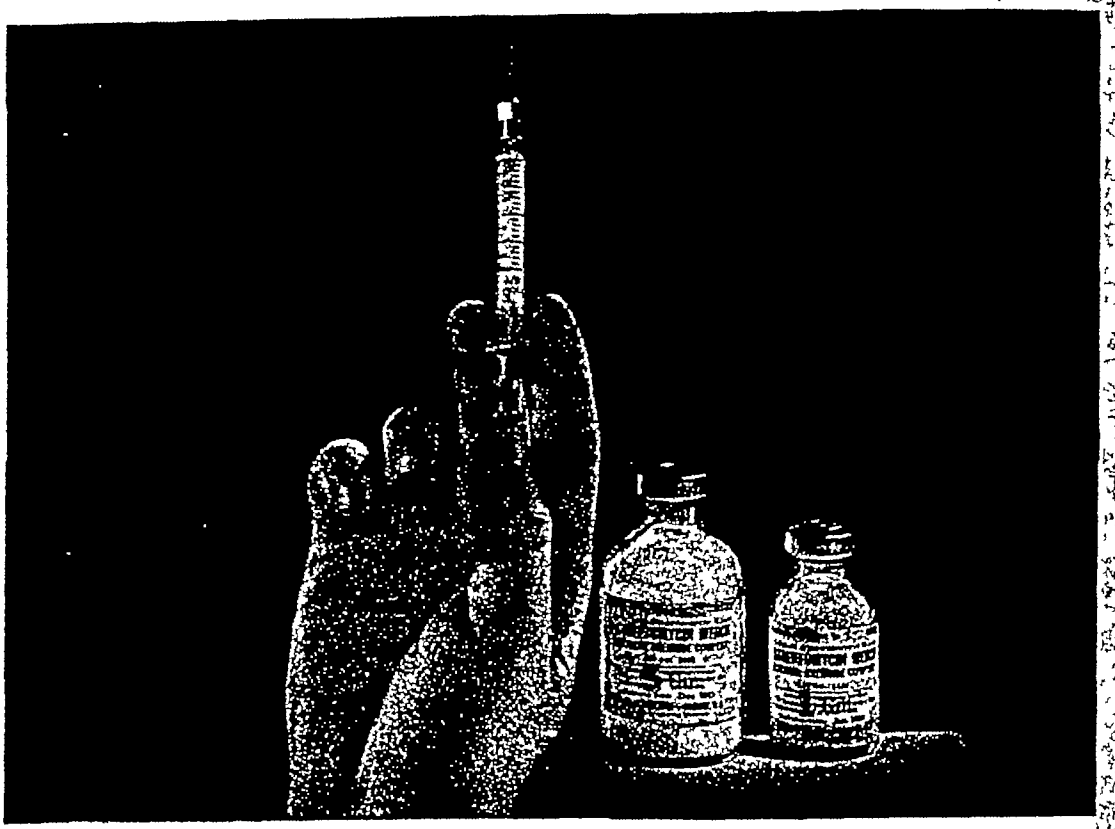
1. J. Pediat. 32:1 (1948).
2. Am. J. M. Sc. 18:513 (1947).
3. J. Pediat. 32:110 (1948).
4. New E. gland J. Med. 236:617 (1947).
5. New York State J. Med. 48:517 (1948).
6. Lancet 1:233 (1947).

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INDEX TO ADVERTISED PRODUCTS

Aldiazol (The S E Massengill Company) 2763
Betalin Complex (Eli Lilly and Company) 2686
Caminoids (The Arlington Chemical Company) 2658
Choline (Flint Eaton & Co) 2664
Cholmodin (Ames Company Inc) 2659
Conestron (Wyeth Incorporated) 2681
Crystalline Procaine Penicillin (Commercial Solvents Corporation) 2685
Daxalan (Dome Chemicals Inc) 2676
Diaparene (Homemakers Products Corporation) 2759
Diatussin (Ernst Bischoff Company Inc) 2656
Digilanid (Sandoz Chemical Works Inc) 2660
Dihydrostreptomycin (E R Squibb & Sons) 2679
Diphtheria Tetanus Pertussis (Parke Davis & Company) 2667
Elixir Alysine (The Wm S Merrell Company) 2nd cover
Essenamine (Winthrop-Stearns Inc) 2661
Galatest (Denver Chemical Mfg Company) 2678
Guathyme (Harmon Chemicals Inc) 2684
Kondremul (E L Patch Company) 2684
Liquiderm (Colin Pharmacal Co) 2668
Liver Extract (Armour Laboratories) 2672
Malt Soup Extract (Borcherdt Malt Extract Company) 2666
Mercuhydrin (Lakeside Laboratories Inc) 2671
Metamucil (G D Searle & Co) 2663
Monacaine Formate (Novocol Chemical Mfg Co , Inc) 2751
Nucarpon (Standard Pharmaceutical Co Inc.) 2757
Nupercaine (Ciba Pharmaceutical Products Inc.) 3rd cover
Oleum Percomorphum (Mead Johnson & Co) 4th cover
Omaderm (Colin Pharmacal Co) 2668
Orapen (Schenley Laboratories Inc) 2673
Phospho-Soda (C B Fleet Co Inc) 2677
Pranone (Schering Corporation) 2665
Premarin (Ayerst McKenna & Harrison, Limited) 2669
Ramses (Julius Schmid Inc) 2761
Sodascorbate (Van Patten Pharmaceutical Co) 2678
Streptomycin Calcium Complex (Merck & Co , Inc) 2674
Thesodate (Brewer & Company Inc) 2749
Thum (Num Specialty Co) 2662
Westsal (Westwood Pharmacal Corp) 2675

Dietary Foods

Milk Stout (Whitbread & Co Ltd) 2751
Similac (M & R Dietetic Laboratories, Inc) 2682

Medical & Surgical Equipment

Artificial Eyes (Fried & Kohler, Inc) 2655
Artificial Limbs (J E Hanger) 2678
Hydrogalvanic Generators (Teca Corporation) 2755
Supports (S H Camp and Company) 2670
Supports (Wm S Rice, Inc) 2676

Miscellaneous

Brioschi (G Ceribelli & Co) 2684
Cigarettes (R J Reynolds Tobacco Co) 2657
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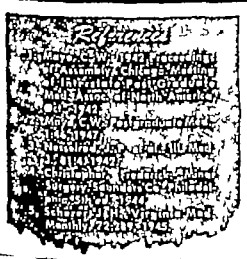
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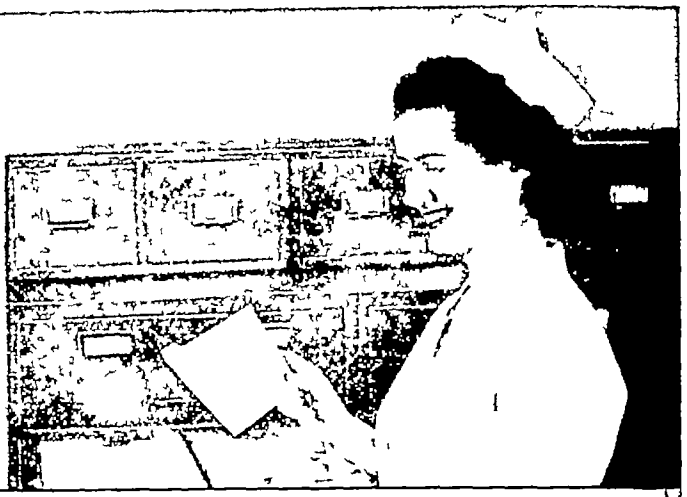
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Classified according to the American Heart Association 44 were in Class IIA (activity slightly limited) and 63 in Class IIB (activity greatly limited)

Before beginning a regime each patient was subjected to a thorough physical examination together with all indicated lab oratory procedures The average of the initial blood pressure readings made at this time was 168 95 The final average figure arrived at was 140-81, a difference of 28 mm of mercury in the systolic and 14 in the diastolic reading These readings were made after a rest period to ob viate the influence of any recent activity

Symptomatic Change According to Age Groups

Age group	No Cases	Improvement Moderate	Marked	None
40 50	11	10	0	1
50-60	41	32	5	4
60 70	34	22	8	4
70-80	18	16	0	2
80-	3	3	0	0
	107	83	13	11

** As reprinted from the New York State Journal of Medicine 35 715 (July 15) 1935*

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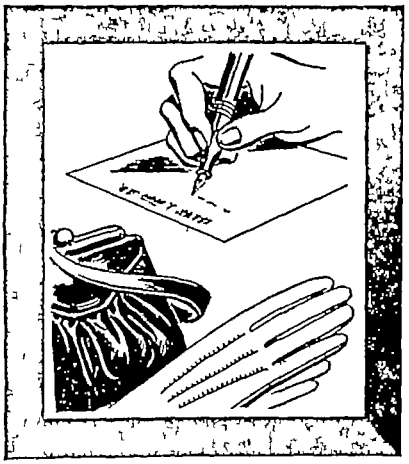
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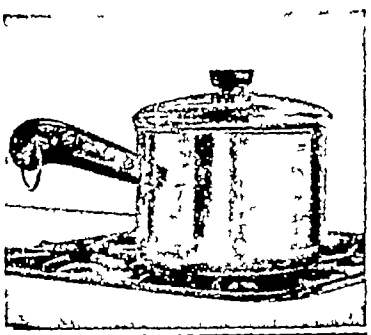
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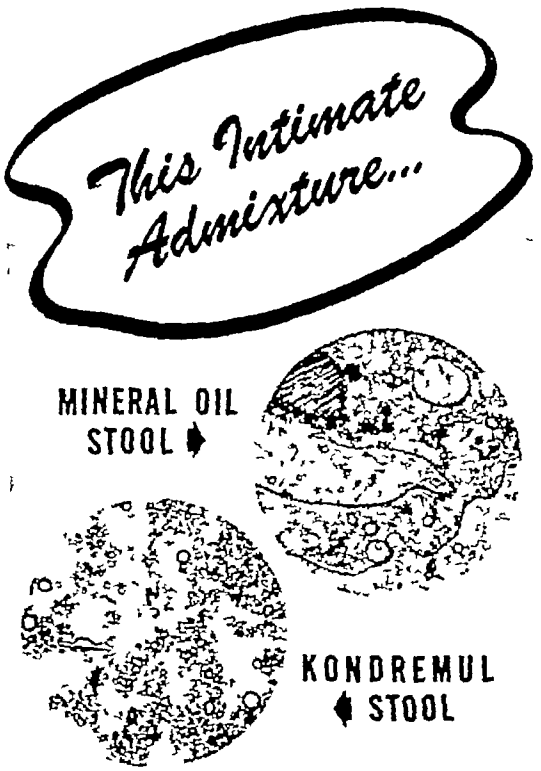


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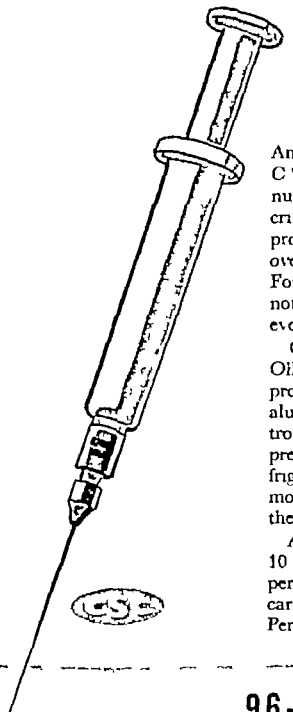


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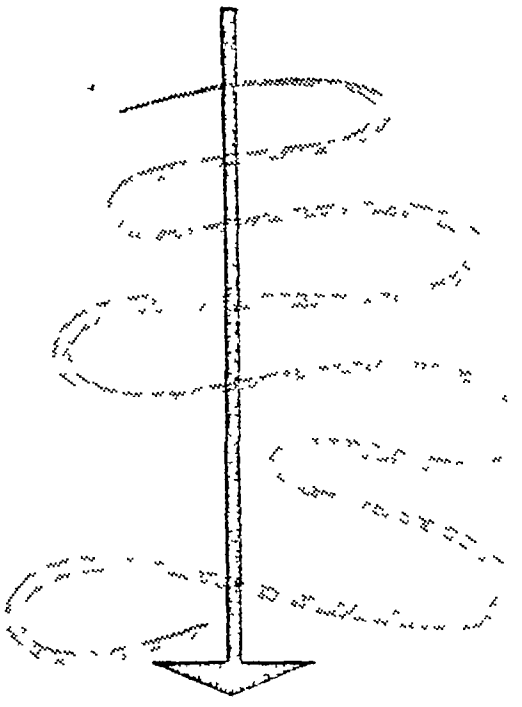
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VOLUME 48 | DECEMBER 15 1948 | NUMBER 24

Editorials

Christmas, 1948

This is not the best of times, it is not the worst of times Our world, the "one world" of the future, is unhappy and unsettled—yet in the approaching yuletide season all peoples will pause to bask in the Christmas spirit, in the joy of giving and receiving, in remembering that for which we celebrate this holiday

Fortunate it is that, once a year, the Christmas holiday, with its aura of peace and happiness, assumes the place of importance in our lives No matter how busy or how complicated our existence—it is impossible to ignore the humble greetings, the familiar Noels the midnight carols—or the desire that every one shall be safe and cared for For this season, at least, the violence of opposing forces and the discordance of quarreling groups is overshadowed by festive spirits and good will

Our wish for you, then is that your Christmas may be merry, and that you may find time for happiness, hours for contentment and well being for the tasks ahead

The Moving Finger Writes

And, having writ, moves on , leaving interesting prospects for the practice of medicine in its train To the putative certainty of Poor Richard's "death and taxes" shortly may be added compulsory sickness insurance and higher taxes. What the citizens have bought they must eventually pay for in some kind of currency

We remember distinctly the gloomy prognostications of a number of generations of American citizens of the head-shaking and/or finger-wagging armchair philosopher variety that this country was going to the dogs. Or maybe over the hill to the poor house, the sense being in either case that rack and ruin stared us in the face Hard times we have had but not yet ruin

Well, here we are for better or worse, for

richer or poorer The Republic seems to have held together so far, contrary to many expectations, and in spite of undercover work by agents of foreign powers A new year lies ahead It is to be hoped that medical statesmanship in dealing with the new administration will take carefully into consideration the fact that it was continued in power by the citizens of this Republic who have thus approved its policies in general, as far as those citizens could comprehend them

National health insurance has been a major domestic objective for some time It does not seem probable that it will be abandoned in the forthcoming years Not because of a realization by its proponents of the validity of arguments against it by the medical profession will it be held in check, but by the direct inescapable responsibility of the incoming administration with a majority in Congress for the enormous and growing costs of the ERP, the huge national debt, the expanding military establishment, the cost of support to China, and the ticklish possibility of a sudden and catastrophic war

National health insurance, with its initial billions of cost regardless of its other and much more serious defects, probably would not for fiscal reasons take precedence over the urgent necessity for immediate and painful increases in income and corporation taxes merely to support what domestic blessings we now enjoy

Meanwhile, the voluntary prepayment plans seem to be making substantial progress This progress will, in all likelihood, accelerate in the next few years as the net balance of personally spendable income after taxes decreases sharply

Medical statesmanship will take into account the fact that the citizens of this nation get what they want, that statistical studies do not always correctly evaluate those wants, that it is incumbent upon the medical profession in its *advisory* capacity to the people of the nation to reiterate the known facts concerning disadvantages of compulsory insurance systems as these affect the quality of medical service If, then, against informed advice, the public insists on national health insurance, medical statesmanship will not have been found wanting

The moving finger, having writ, moves on, "nor all your Piety nor Wit shall lure it back to cancel half a line "

Stop, Look, Listen, II

In our first editorial under this title we discussed the objectives of the World Medical Association as set forth in the twelve resolutions of the Second Annual Meeting of the Association at Geneva [1]

Does it appear odd to anyone that the representatives of 29 nations, speaking different languages (one of them, Bulgaria, from behind the Iron Curtain) should be in unanimous agreement on a set of twelve resolutions governing "social security," if such legislation includes medical care? To the representatives of most of those 29 nations the inclusion of medical care in "social security" or compulsory health insurance schemes was a reality Reporting the proceedings to the October meeting of the Council of the Medical Society of the State of New York, Dr Louis H Bauer, Secretary-General of the United States Committee of the W M A said

> They spent nearly a day and a half in discussing social security and health insurance, because that is a very important factor in their lives They all have it, and they all wish they did not have it They would like to do something to protect what little freedom they have left, and if possible to get some back that they have lost [2]

These doctors of 29 nations are furnishing the physicians of this country a picture of the disaster of governmental control of medicine through "social security" where this includes medical care, a disaster of such magnitude that to salvage some shards of liberal medical practice from the rubble, they must depend upon the W M A and the help which we in this country can still provide Dr Bauer said further

[1] New York State J Med 48 2575 (Dec. 1) 1948.

[2] Minutes of the Council October 1948

Perhaps some of you saw the editorial which appeared in the A.M.A *Journal*, urging state and county societies and national organizations to become supporting members of the United States Committee of the World Medical Association and I wish to talk on that

As you know, the income of the World Medical Association itself is infinitesimal in that it gets only dues from member associations, many of whom have little or no money and if they have they cannot pay their dues because they cannot get the money out of their country We had, up until last April three bank accounts, one in Zurich, one in Paris and one in London The money in Paris and London can only be spent in those countries because they cannot send it out so we established a new account in New York in April to which our own dues (the American Medical Association's ues) and the dues of the Canadian MedicaldAssociation and some of the Latin American countries are being paid in dollars here in New York and where of course we can use it, but even so the income is altogether too little. So the United States Committee was formed to raise money really to support this organization in the way it should be run One of the strings attached to that offer was that the headquarters of the organization were going to be located in the United States We said North America, then they picked the United States and that was agreed to We have agreed to underwrite the expenses of that Secretariat, the traveling expenses of members of the Council, and the publication of a Bulletin We first thought that it could be done on $50 000 a year Now we know that that is not adequate, it is going to cost $75,000 to $100 000 a year The A.M.A., the Mayo Clinic and the International College of Surgeons have each contributed $2,000 a year toward the support of this. Many of the national industrial organizations have contributed The National Foundation for Infantile Paralysis and the American Red Cross have each contributed $5 000 The Pfeiffer Foundation contributed $10,000, and a number of others have contributed from $1,000 to $5 000 Some of the other national medical associations are contributing and this editorial urges county and state societies to become members.

The Medical Society of the State of New York has become a member of the United States Committee It is to be hoped that the component county medical societies of this State and many individual doctors will become members also Encouragement of the World Medical Association would seem to be not only the support of an ideal, but good, hard, common or horse sense That which benefits the medical profession of the entire world helps every individual patient and his doctor

Send your application for membership to United States Committee, Inc, World Medical Association, 2 East 103rd Street, New York 29, New York

J.A.M.A. 138:366 (Oct. 2) 1948.

Current Editorial Comment

Serum Hepatitis Some of the doubt mystery and confusion surrounding two virus diseases (both involving the liver) are gradually being dissipated Infectious hepatitis (IH) and serum hepatitis (SH) differ in many respects including antigenic and immunologic differences [1] Infectious hepatitis has a shorter incubation period (18 to 40 days), it may become epidemic the virus may be recovered from the stool it can be modified or prevented by the use of gamma globulin, and, in those not completely protected, gamma globulin causes no prolongation of the incubation period

On the other hand, serum hepatitis (SH) has a longer period of incubation (60 to 150 days) and a lack of clear-cut epidemics, SH virus has not been recovered from the stool protection by the use of gamma globulin is uncertain, and, in those not completely protected, gamma globulin causes prolongation of the incubation period In experimental studies in a group of volunteers, the batches of gamma globulin tested did not contain neutralizing or inhibiting factors effective against the strain of serum hepatitis virus used

In quest of a means more reliable than gamma globulin for the prevention of serum hepatitis (SH), Blanchard *et al* succeeded in rendering icterogenic serum and plasma safe for administration by ex-

[1] Stokes, Joseph, Jr *et al.* J.A.M.A. 138 336 (Oct. 2) 1948.

posure to ultraviolet rays [2] Eleven volunteers showed no evidence of hepatitis following intramuscular injection of 7 cc of irradiated serum The period of observation was five months The incidence of hepatitis in a group of fifteen controls, each of whom received only 4 cc of nonirradiated icterogenic serum intramuscularly, was 47 per cent

For processing the icterogenic serum, the Habel-Sockrider type of apparatus was used Eighty-five per cent of its radiation was given off in the 2,537 angstrom unit wavelength The rate of flow was 24 cc per minute, and the time of exposure was ten seconds Irradiated plasma revealed no alteration of the electrophoretic pattern The plasma proteins were essentially normal There was a slight decrease in prothrombin and complement Irradiated serum produced no untoward reactions, and subsequent tests revealed no evidence of acquired sensitivity This clear-cut result strongly favors the routine use of exposure of serum and plasma to ultraviolet rays under properly standardized conditions

[2] Blanchard Mercer C *et al* *ibid* 138 341 (Oct 2) 1948

In Memoriam

James Alexander Miller, M D

Dr Miller was one of the founders of the Committee on Public Health Relations of the New York Academy of Medicine, which was organized on May 1, 1911 Although at the time he was one of the youngest, if not the youngest member of the Committee, he very soon became its directing genius More than any other single person, he helped to establish the Committee's course of action and to mold its policies His keen mind and clear vision, his tact, dignity, and judicial temperament, his high sense of reality, and his statesmanlike progressive attitude toward community requirements made him a peerless leader

He became chairman of the Committee in 1929, having acted temporarily in that capacity on many occasions during his predecessor's illness In 1936, upon election to the presidency of the Academy, Dr Miller resigned the chairmanship of the Committee but was persuaded to accept it again in 1942 during the war when the then chairman joined the armed forces Although suffering a great deal of physical pain during the last few years of his chairmanship, he kept a devoted interest in the work of the Committee, and, except for the last year, attended meetings regularly, although with much effort

During his continuous service on the Committee for thirty-seven years, Dr Miller exercised great influence on public opinion, on methods of procedure in public health and allied fields, and on the attitude of the medical profession toward many of the complicated problems that lie between clinical medicine and medical education, on the one hand, and community needs on the other In the course of his long public activity, he gained many devoted friends and followers, and he has left an indelible imprint on the annals of his time

The Committee herewith wishes to record with deep emotion its profound sorrow in the passing of its beloved leader, a great physician, a great humanitarian, and a great educator

Committee on Public Health Relations
New York Academy of Medicine

October 11, 1948

FACTS ABOUT NUTRITION

Prepared by the School of Nutrition, Cornell University, Ithaca
Norman S Moore, M D , Editor

Diet Inventory Methods for Doctors, II

In the last issue the discussion of diet inventory methods considered the many sources from which information is obtained It was suggested that the physician use a card which acts as a reminder in history taking and also provides a permanent record

On this page an attempt is made to concentrate comment on the evaluation of data obtained at the interview The data usually having been obtained from a quick history, do not warrant more than qualitative treatment. Evaluation is most easily made by comparison with some arbitrary dietary pattern Such a diet pattern for adults is found in Table 1

TABLE 1.—DIETARY PATTERN FOR ADULTS (FOR COMPARISON PURPOSES)

Food Class	Amount per Day	Major Contributions
Milk or equivalent in cheese	2 or 3 cups	Calcium riboflavin protein some vitamin A
Meat, fish, poultry or dried legumes	1 to 2 servings	Protein, iron niacin some thiamin
Egg	1 per day or 3 to 4 per week	Protein iron some vitamin A and riboflavin
Fruits and vegetables, including Citrus fruit or tomato (twice as much)	4 to 5 servings (½ cup each)	
	1 serving	Ascorbic acid
Green leafy or yellow vegetable	1 serving	Provitamin A plus riboflavin and iron and calcium in green leafy vegetables
Whole grain and enriched cereals and breads	2 or more servings	B vitamins; some iron and protein
Butter or a fortified margarine	1 or more tablespoons daily	Fat and vitamin A
Additional food to maintain proper weight		

It takes judgment and knowledge of food values to use this scheme If the patient's intake is similar to Table 1, his nutrient intake will probably be adequate to meet the Food and Nutrition Board s recommended allowances The comparison will indicate the weak spots in food intake and may be used as the basis for recommendations to the patient The table cannot be used however, for foreign food patterns or for diets where large quantities of only a few foods are used that is a less varied diet The table reveals that calcium adequacy is largely dependent on milk and cheese intake To meet fully the new standards three cups of milk plus a good diet are necessary Many feel that the calcium in one pint of milk with a varied diet is adequate The Food and Nutrition Board s revised recommended allowances which show an increase for calcium may call for more than a pint of milk with a varied diet When viewing the normal intake pattern of the table one sees that vitamin A is supplied in a substantial quantity by carotene from a large daily serving of a green leafy or yellow vegetable Unless the serving of the latter is very large, an additional source of vitamin A such as whole milk or an egg or butter or fortified margarine, must be added each day The table points out that ascorbic acid is provided by a serving of citrus fruit or a double quantity of tomatoes. Other vegetables and fruits also contribute some ascorbic acid particularly if eaten raw In the table riboflavin is provided from three main sources namely milk, eggs and green leafy vegetables. About three cups of milk one egg and a serving of a green leafy vegetable are required daily Iron adequacy rests to a major extent on the red meat intake, with smaller but important contributions from eggs whole grain cereals potatoes, and green leafy vegetables Thiamin is the nutrient most difficult to evaluate by diet pattern It is present in only limited

quantities in a wide variety of foods A generally well-balanced diet with the use of enriched and whole grain cereals and breadstuff is probably the best source Calories can be judged on the basis of weight

In Table 2 one will find a convenient protein guide which may be used in evaluating data obtained for this important nutrient Protein adequacy in the diet is based largely on the consumption, in proper amounts, of meat or its substitutes and milk

TABLE 2 —SCHEME FOR PROVIDING PROTEIN FOR A DAY (60-70 GM) FOR AN ADULT

Food	Amount	Gm of Protein
Meat fish or poultry	4 oz serving	20
Milk	1 pint	17
Meat substitute as	1/4 cup cottage cheese or 1/2 cup cooked dried legumes	10
Egg	1	6 5
Whole grain cereal or bread	3 servings	7 5
Potato	1 medium	3
Green leafy or yellow vegetable	1 serving	2
Citrus fruit	1 serving	1
Other fruits and vegetables	2 servings	2
		69

The best practice for the physician to follow is to record his dietary impressions at the time of evaluation and also to record the recommendations which he makes This record forms a basis for checking progress quickly on return visits

For comparison with clinical or laboratory findings, one may require a quantitative evaluation of the diet in terms of specific nutrients The need for such an evaluation must be known before the history is taken, for in this event careful inquiry should have been made regarding quantities of intake It must be realized that at best these figures are not accurate For purposes of calculation, the two most easily used and inexpensive tables available are the new U S P H S "Food Value Tables for the Calculation of Diet Records" and the sixth edition of *Food Values of Portions Commonly Used*, by Bowes and Church [1 2] In addition several "short" methods of dietary analysis are available In these various methods of analysis, foods of similar composition are grouped together, and weighted mean values are given for each of the nutrients The best known of these is the one by Donelson and Leichsenring [3] It is published in Turner's *Handbook of Diet Therapy*, the accepted manual of the American Dietetic Association, other short methods include those of Berryman and Steinkamp [4]

References

1 Boyd E French, Eads M G and Sandstead H R - Food Value Tables for Calculation of Diet Records Washington D C United States Public Health Service States Relation Division Nutrition Section 1947

2 Bowes A deP and Church C F Food Values of Portions Commonly Used 6th ed , Philadelphia Child Health Association 1946

3 Donelson E G and Leichsenring, J M J Am Dietet A 21 440 (1945)

4 Turner, Dorothea Handbook of Diet Therapy Chicago University of Chicago Press, 1946 p 112

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Scientific Articles

THE FEMALE PERINEUM ITS STRUCTURE, FUNCTION, AND PRESERVATION

RAYMOND J PIERI, M D and FRANK C MEYER, M D Syracuse, New York

(From the Department of Obstetrics Syracuse University College of Medicine)

OBSTETRICIANS and gynecologists no longer allude to the female perineum as the area between the vagina and anus The term "perineum" is accurately employed to denote all those soft parts both muscle and fascia which correspond to the inferior aperture or outlet of the bony pelvis In addition to that important wedge-shaped structure which anatomically is called the perineal body the term also includes those structures of equal or greater importance which are found in both the anterior and posterior triangles of the pelvic outlet

Childbirth is usually considered a normal process. Yet in nearly every delivery the tissues of the female perineum are subjected to variable degrees of trauma, which lead to impairment of their function and invite subsequent invalidism of the mother

The purpose of this presentation is twofold—to emphasize the functions of these structures, especially during labor, and to plead the importance of their obstetric preservation. This necessitates first a consideration of their structural or anatomic relationships

Structure

The outlet of the bony pelvis, seen from below, presents two commonly recognized landmarks, the ischial tuberosities Between their widest points an imaginary line corresponds to the bisischial diameter of the outlet and forms the common base of two triangles. The bisischial line traverses the perineum just anterior to the anus The apex of the anterior, or urogenital triangle is the subpubic ligament while the apex of the posterior or rectal triangle is the sacrococcygeal joint

The relations between these landmarks and the female perineum can best be perceived by visualizing the bony outlet in the human figure The external genitalia occupy the anterior triangle while the anal orifice appears in the posterior triangle

Removal of the skin and superficial fascia of both triangles reveals that the bisischial diameter AB corresponds somewhat closely with an anatomic division between the anterior (urogenital) triangle and the posterior (rectal) triangle (Fig 1) In the anterior triangle a rather dense layer of the deep superficial fascia (Colles' fascia) is encountered Along line AB this fuses with the posterior limits of a deeper, double plane of fascia, the so-called triangular ligament (or urogenital diaphragm)

In the posterior triangle there is first a layer of superficial fat Removal of this discloses the ischiorectal fossae the external rectal sphincter the anococcygeal body, and the anal fascia. The anal fascia covers the inferior aspect of the levator muscles (pelvic diaphragm)

Careful dissection of the anterior triangle shows it to be composed of two flat compartments on each side of the midline (vagina) The most

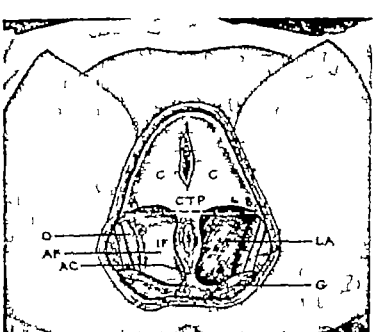


FIG 1.

Presented at the 142nd Annual Meeting of the Medical Society of the State of New York, New York City Section on Obstetrics and Gynecology May 20 1948.

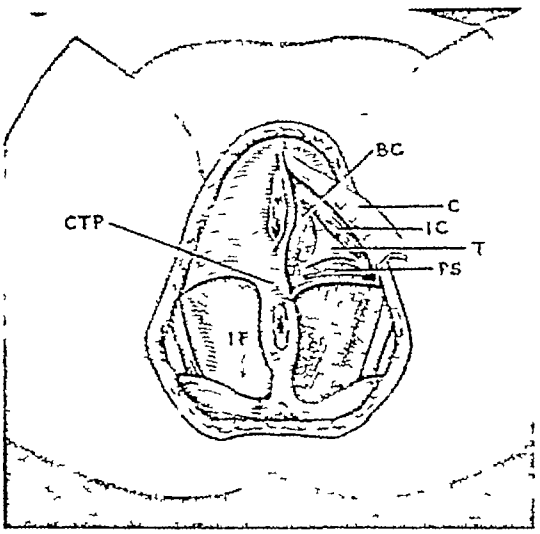


FIG 2

superficial (inferior) of these is opened by reflecting Colles fascia laterally (Fig 2) This exposes its contents, the ischiocavernosus, the bulbocavernosus (constrictor cunni), and the superficial transverse perineal muscles Medially, the latter two contribute fibers to the central tendon of the perineum, or perineal body

The "roof" of the superficial compartment is discerned as the inferior of two flat layers of thin fascia (triangular ligament urogenital diaphragm, or urogenital trigon) which enclose the so-called "deep" compartment Thus, the roof of the superficial compartment forms also the "floor" of the deep compartment Removal of the structures of the superficial compartment and opening the inferior (floor) of the two fascial layers of the urogenital diaphragm reveals the contents of the deep compartment interposed between them (Fig 3) Two muscles may be identified here, the sphincter muscle of the membranous urethra and the deep transverse perineal muscle The latter muscle is also inserted medially into the perineal body As previously indicated, the roof of the deep perineal compartment is the superior of the two fascial layers of the urogenital diaphragm Posteriorly, along the bisischial line, they fuse with each other and with Colles' fascia

The ischiorectal fossae thus potentially extend from the posterior triangle anteriorly between the superior fascia of the urogenital triangle and the inferior levator (anal) fascia (Fig 3) Actually, however, these fossae do not extend forward beyond the bisischial line

The anal fascia invests the inferior surface of the paired levator ani muscles The superior surface of the levators is likewise covered by fascia These two fascial layers collectively are referred to as the pelvic fascia The levatores ani form the pelvic diaphragm

Removing the various structures of which the urogenital diaphragm is composed and dissecting the anal fascia off the inferior surface of the levatores ani reveals this most important paired muscle, the pelvic diaphragm (Fig 4) Anatomically two parts of each levator are recognized The medial portion (pubococcygeus) passes backward from its pubic origin lateral to the vagina Some fibers mingle with longitudinal fibers of the vaginal wall and with the bulbocavernosus muscle Others decussate in the perineal body The main portion proceeds to mingle somewhat with the external sphincter, but chiefly with the anococcygeal body itself

The lateral portion (iococcygeus) of the levator arises from the "white line" of the tendinous

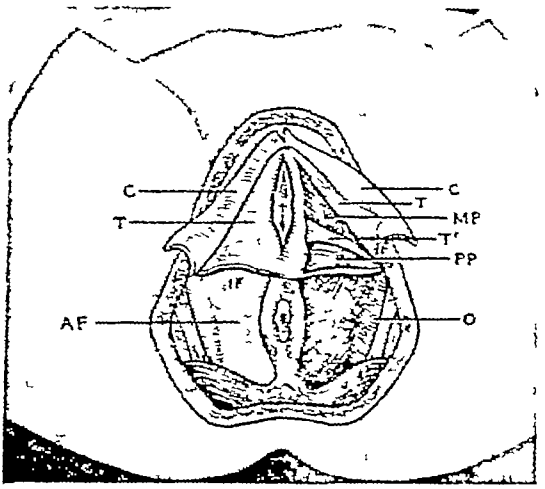


FIG 3

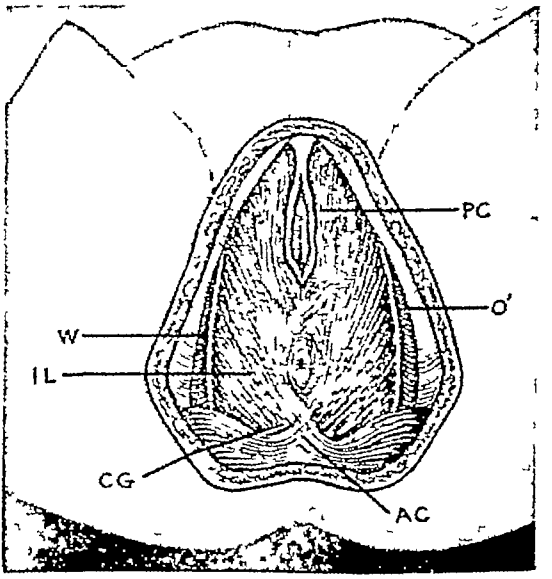


FIG 4

arch (see below) Most of these fibers pass downward and backward Some join their homologues of the opposite side in the obstetric perineum, others terminate in the anococcygeal body, and still others insert into the lateral margins of the coccyx. More posterior to the levator fibers the coccygeus and pyriformis muscles complete the closure of the aperture of the pelvic outlet

The pelvic floor thus resembles a trough with a V-shaped conformation, sloping downward and forward from its closed beginning (anococcygeal body) to its anterior opening (vagina) Aside from the primary function of support to the pelvic viscera this arrangement of the soft tissues (fascia and muscle) of the female perineum is of vast importance in the mechanism of labor When the pelvic floor is seen from above, it becomes manifest how, during childbirth, the presenting part is guided through the birth canal along the line of least resistance via the vagina and pelvic outlet into the outside world

Laterally, on each side of the levators, both superior and inferior layers of the pelvic fascia (levator fascia) fuse with each other and with the fascia covering the inner surface of the obturator internus The ridge thus formed is the arcus tendineous of the levatores ani, called by anatomists the 'white line' because of its unmistakable appearance. The white line of fascia extends posteriorly and downward on each side to the ischial spines, where it terminates about 5 cm below the plane of the pelvic inlet

Slightly below and medial to the white line the superior levator fascia thickens to form a band like base or ridge of fascia, the tela endopelvina, or main sheet of visceral fascia, which gives off four main layers One layer invests the bladder a second lies between bladder and the noncontractile segment of the uterus above, and between bladder and vagina below A third layer lies between vagina and rectum, while the fourth is posterior to the rectum

Function

The proper support and normal function of the pelvic viscera depend upon the integrity of their respective fascial investments All skeletal muscles are likewise sheathed in fibro-elastic tissue (fascia) Normal elasticity exists only within certain limits. Any such structure which sustains damage to its fascial support soon weakens In the case of a muscle the unsupported fibers become separated, and the muscle herniates Just as the body depends upon the integrity of the bony skeleton for support so do all skeletal muscles and most viscera depend upon the integrity of their fasciae.

During late pregnancy, through hormonal and vascular influences the entire perineum projects several centimeters below its level in the nonpregnant state While there is also a general increase in soft-part elasticity, this is seldom sufficient to allow the birth of a full term infant without some structural damage accompanying the accidents and trauma associated with delivery

With the onset of labor the powers of the uteroabdominal contractions are expended chiefly in dilating and stretching both fascia and muscle. The infant is forced like a wedge through three main levels of resistance, the cervix the levatores (posterior or anal triangle) and the structures of the urogenital triangle There results a profound stretching and distortion of the birth canal Lacerations are common accidents

The anatomic sequelae of these accidents are loss of visceral support, descensus, sagging of the bladder and urethra, cystocele and rectocele and gaping of the orifices of both triangles. Most of these result from single or multiple tears in one or more of the various layers of muscle or fascia Even overstretching beyond the normal elasticity predisposes to later loss of support Often the damage is recognized in the form of visible tears but not infrequently, it is concealed beneath an apparently intact vaginal mucosa which is noted for its redundance

Preservation

Most of the tears of soft tissues occur late in the second stage of labor after the presenting part has reached the pelvic floor Episiotomy properly timed and executed, usually creates sufficient additional space to prevent most lacerations of the perineum It has for its objectives the relief of excessive strain upon the structures of both triangles the substitution of a clean incision for ragged tears during delivery and, following childbirth, the preservation of structure by a neat repair

Episiotomy is not an innovation. It was performed by Ould in 1742 Many teachers have since observed its indications and contraindications but the minutiae of anatomy and technic have for the most part been disregarded

Normally delivery is not attempted until the presenting part is on the levators, with evidence of pressure (bulging) on the perineum, accompanied by distortion of the anus and the appearance of 'caput' Following the usual preparation for delivery the bladder is catheterized and the perineum gently 'ironed out' manually accompanied by the liberal use of neutral liquid soap It is important to avoid overstretching. This causes future loss of muscle tone and damage to fascia It is likewise important to avoid too rapid manual dilatation This favors laceration

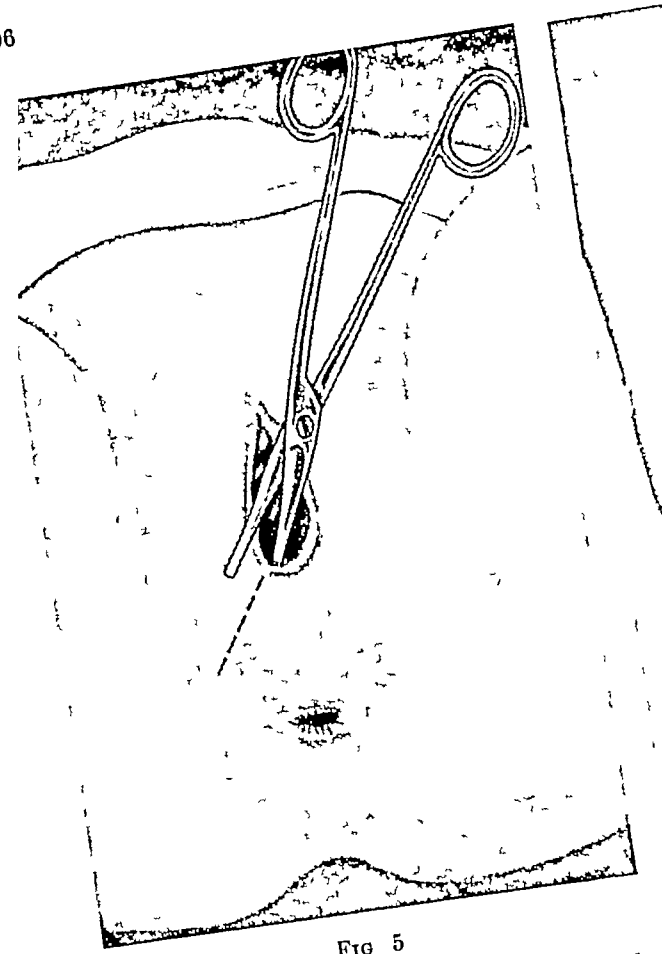


FIG 5

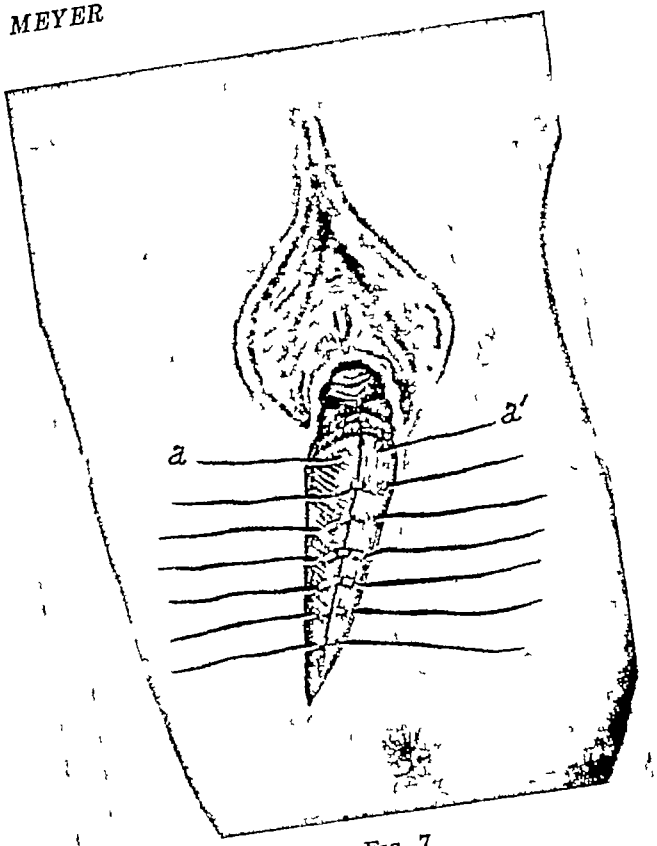


FIG 7

The site of incision is usually mediolateral, right or left, chiefly because accidental extension of the cut in either case avoids the sphincter Sharp scissors are necessary (Fig 5)

The length of the incision determines which structures are severed by the episiotomy At times, in pathologic cases, even the ischiorectal fossa may be involved Ordinarily, however, one severs the vaginal mucosa, skin, Colles' fascia, the bulbocavernosus, the transversus perinei, the urogenital septum, and the median fibers of the pubococcygens portion of the levator (Fig 6) Following delivery, any persistent bleeding from severed vessels is controlled with Allis clamps No attempt at suturing is advised until the placenta is delivered, after which a vaginal pack is inserted to keep the field clear during the repair

Ordinarily, inspection of the incision does not reveal details of individual anatomic structures, except for muscle tissue and Colles' fascia (Fig 7) The latter is usually found retracted under the integument and superficial panniculus

The following technic of repair avoids the passing of sutures through either mucosa or skin All sutures are fine chromic catgut, number 000, tied only securely enough to secure coaptation The first stitch, aa', is submucous and is passed widely around the upper angle of the incision (Fig 7) This is to bring together any fibers of muscle or fascia which may have become invisibly separated beneath the mucosa Neglecting to observe this precaution favors subsequent rectocele if such an occult separation exists The first layer consists of interrupted sutures (Fig 8) Allis clamps are used as retractors

The second layer of sutures includes Colles' fascia and is likewise interrupted Its important feature is the "crown stitch" This coaptates the retracted ends of the severed bulbocavernosus

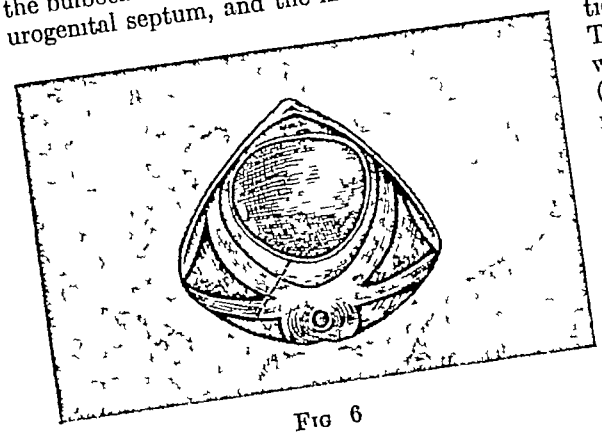


FIG 6

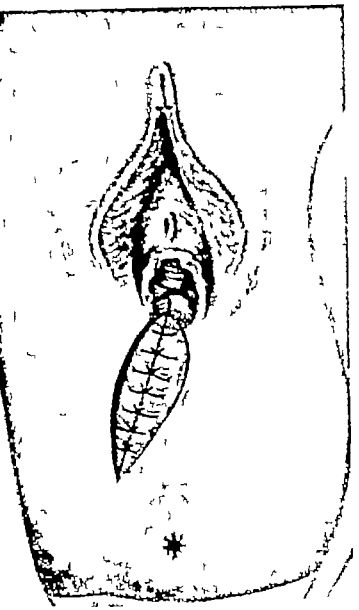


FIG 8

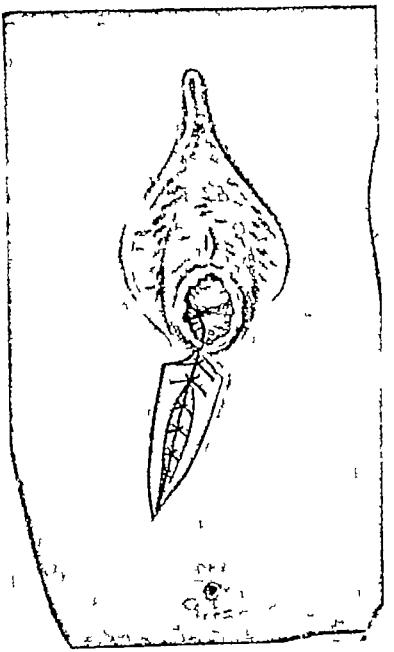


FIG 9

nuscle and restores the hymeneal ring (Fig 9) To accomplish this the needle must be inserted obliquely upward in the base of the labia minora in order to grasp the constrictor fibers. In some cases, to prevent gaping of the vagina two such sutures may be required

The skin is closed by a continuous subcuticular suture on a fine needle beginning at the lower angle of the cut (Fig. 10) As the integument is thus coaptated Allis clamps are applied gently to its everted edges (Fig 11) A dozen such clamps are ready for use in each case These are permitted to remain clamped for only a few moments during which the vaginal pack is removed any clots expressed, and preparations made for transfer of the patient to her bed

Apposition of the cut edges of the skin in this manner makes adherence quite effective, results in a fine linear scar, and seems to reduce appreciably the degree of postoperative discomfort (Fig 12) Routine perineal care is exercised following delivery Early ambulation is encouraged Hospitalization of normal patients postpartum averages seven days *

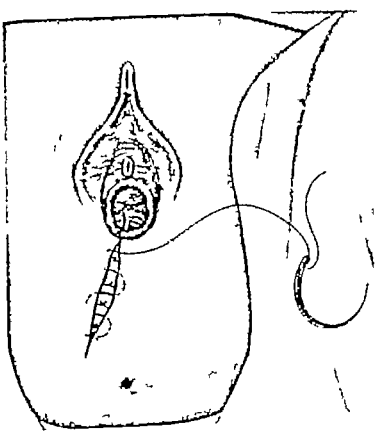


FIG 10

* Routine of the obstetric division of the Medical Center Syracuse University

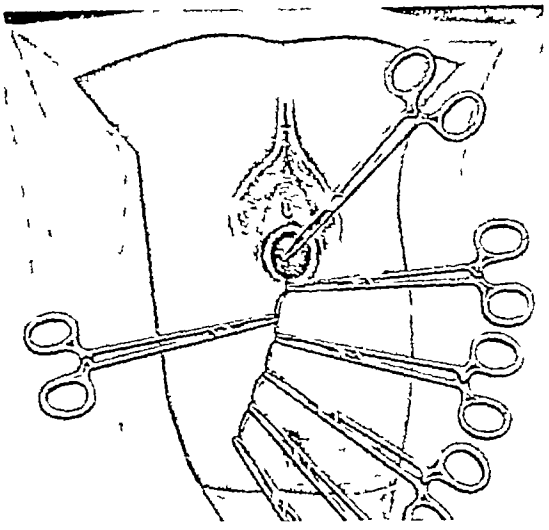


FIG 11

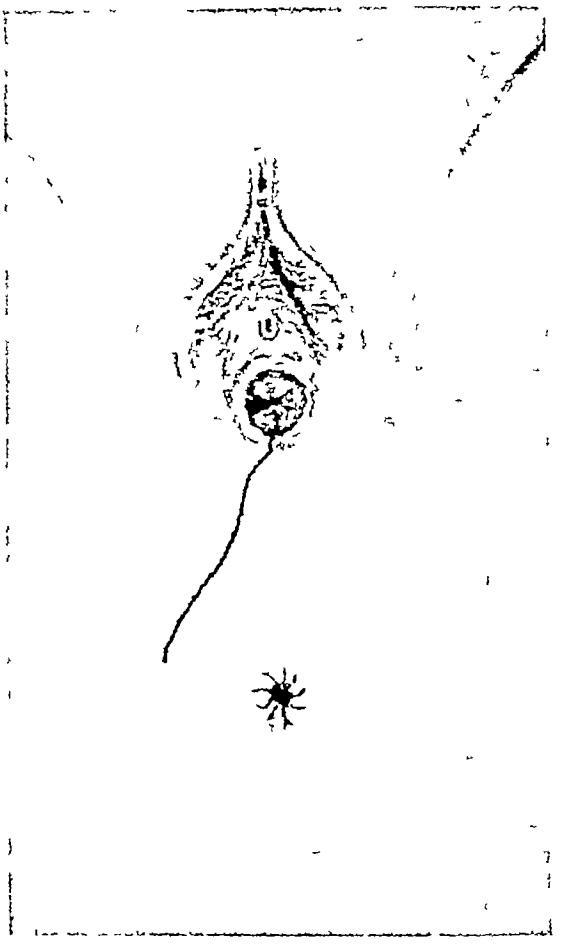


FIG 12.

Summary

A review of the structure of the female perineum is presented to assist the obstetric attendant in an understanding of its importance A brief outline of the function of these parts is included It is emphasized that nearly every delivery is accompanied by trauma and often followed by permanent damage Episiotomy is suggested as a means of avoiding most of the severe lacerations of the perineal structures A simple and effective technic of repair is included

Discussion

W D George, M D , *Watertown* —There is no question but what mediolateral episiotomy is much the safer in most cases, because of less danger to the sphincter ani, and will usually leave the patient with as good a perineum as she had before her pregnancy

Occasionally, we see a patient in her first pregnancy with no tone to her ligaments or musculature, in early pregnancy the uterus may be prolapsed to the introitus Such a patient, even with a well-executed and well-repaired episiotomy, will still have her prolapsus and a poor perineum However, fortunately, these cases are exceptional

Dr Pieri says "no attempt at suturing is advised until the placenta is delivered," and with the use of present oxytocics, the placenta does deliver promptly However, in perhaps 5 per cent of the cases where this does not occur and where there is no excess bleeding requiring manual removal of the placenta, I see no objection in going ahead with the repair of the episiotomy Membranes hanging over the external perineal skin should be trimmed off and the remainder held above the episiotomy incision by a vaginal pack If the placenta seems to be separated at any time during the repair, it may be delivered promptly

I prefer number 0 chromic catgut rather than 000 chromic However, I do not doubt but what Dr Pieri gets excellent repair with his lighter catgut

Raymond L Rhodes, M.D , *Glens Falls* —This paper gives an excellent summary of the anatomic structure and the resulting physiologic functioning of the female perineum at childbirth Many obstetricians in the past either did not realize the importance of perineal preservation to the patient in later years or else chose to ignore this factor In more recent years, however, the trend of care of the woman at parturition has swung from the theory of allowing nature to take its course with repair of only visible tears to a more logical method of assisting and abetting nature during this normal process, with the routine use of episiotomies Once again the use of this surgical procedure is of very little aid unless the anatomic structures of the female perineum are understood, in order that proper re-approximation of said structures in their normal relationship can be carried out

It is the feeling of Dr Pieri, as it is of most obstetricians, that a happy medium should be reached on the stretching of the pelvic hammock The allowing of the baby's head or rump, whichever dilating

wedge may be presenting, to reach the pelvic floor and cause the structures to stretch is the point where obstetric interference can do much to prevent ir repairable damage There is no doubt that at this point the use of low prophylactic forceps plus an episiotomy, not only preserves and protects the fascial supports and the muscular attachments from multiple unrepairable tears but likewise does much to prevent trauma to the baby s head.

The repair of this episiotomy is important other wise the obstetrician has lost the benefits for which it was performed If the levator muscles and fascial supports are not re-approximated, including the sphincter ani (bulbo cavernosus) a relaxed perineum may result with the common rectocele oc curring in later years. An interesting study along this same line of thought would be to make a detailed report on vaginal plastics of the past year versus twenty years ago in regard to age number of babies, forcep deliveries and routine episiotomies Maybe this work has been done, but I have never happened to see the report It is my impression that there are fewer vaginal repairs being done today than ten or fifteen years ago

The early ambulation (twenty four to forty-eight hours postpartum) of patients as practiced in many clinics, does not fit into my understanding of the physiology of the parturient patient Knowing that the pelvic structures are relaxed for delivery of a baby it is questionable in my mind whether too early ambulation is wise The weight of the abdominal contents, including the parturient uterus is thrown on the already relaxed structures and it seems as though further permanent stretching would occur I do not feel the same about early convalescence of surgical cases where the tissues are normal in tone Dr Pieri s practice averages seven days for convalescing postpartum cases I have followed the routine of having the patients ambulatory on the seventh day and home on the eighth day I do feel that these same patients should be encouraged with exercises in bed to avoid the surgical complications for which we advocate early ambulation of laparot omies

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PRIZE ESSAYS

The Merrit H. Cash Prize and the Lucien Howe Prize will be open for competition at the next Annual Meeting of the Medical Society of the State of New York, May 2, 1949 in Buffalo

The Lucien Howe Prize of $100 will be presented for the best original contribution on some branch of surgery, preferably ophthalmology The author need not be a member of the Medical Society of the State of New York

The Merrit H Cash Prize of $100 will be given to the author of the best original essay on some medical or surgical subject Competition is limited to the members of the Medical Society of the State of New York, who at the time of the competition are residents of New York State.

The following conditions must be observed

Essays shall be typewritten or printed with the name of the prize for which the essay is submitted, and the only means of identification of the author shall be a motto or other device. The essay shall be accompanied by a sealed envelope hav ing on the outside the same motto or device, and containing the name and address of the writer

If the Committee considers that no essay or contribution is worthy of a prize it will not be awarded

Any essay that may win a prize automatically becomes the property of the Medical Society of the State of New York "to be published as it may direct."

All essays must be presented not later than February 1, 1949 and sent to the Chairman of the Committee on Prize Essays of the Medical Society of the State of New York, 292 Madison Avenue, New York 17, New York.

ARMITAGE WHITMAN, M D , *Chairman*
Committee on Prize Essays

SOME ASSOCIATED EYE AND SKIN MANIFESTATIONS OF SYSTEMIC DISEASE

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(From the Departments of Ophthalmology of New York University, College of Medicine, and Bellevue Hospital)

COOPERATION between ophthalmologists and specialists in other branches of medicine is still essential to unravel the heterogeneous picture of disease with symptoms originating in different parts of the body Changes which were previously regarded as separate diseases have in many cases been found to be only symptoms or combinations of symptoms of general affection In some cases the embryologic similarity in origin—namely, the ectoderm—and, in other cases, involvement of the vascular system or the bringing of toxic agents of systemic nature to both the eye and skin make for the simultaneous appearance of lesions in both as manifestations of general disease

A complete and comprehensive discussion of all known conditions with both eye and skin expressions would necessitate more time than a short paper allows At this time, since only a few diseases can be mentioned, those conditions where a new thought can be introduced will be given preference

Phakomatoses (Van der Hoeve)

Bourneville's Disease—In 1880 Bourneville showed that tuberous sclerosis of the central nervous system leads to mental deficiency and epilepsy [1] That the changes are associated with sebaceous adenoma of the skin was demonstrated by Pelagatti in 1904 and Vogt in 1908 [2] The sebaceous adenoma (Pringle's Disease, 1890) appears as grain-sized, usually brownish-red papules, forming a butterfly-like pattern on the nose and cheeks [3] The histologic picture varies with the amount of adipose tissue and connective tissue In 1921 Van der Hoeve showed that retinal tumors, grayish-white or glossy white, often raspberry-like in form due to papillomatous excrescence, may occur [4] Histologically, the cerebral and retinal changes consist of gliosis and ill-differentiated large glial or ganglion cells and fibrils Cysts in the tumors are seen, and Van der Hoeve records one case in which such a cyst ruptured and probably implanted itself elsewhere in the retina He also notes a case that had one tumor in each eye Fifteen years later a highly calcified tumor and many additional tumors were noted

A case that I have observed since he was eight months old, when a diagnosis was made from the fundus appearance and confirmed by encephalogram, showed not only an increase in the number of retinal tumors of one eye but a transition of the cystlike growth of the optic disk of the opposite eye into the classic mulberry appearance gradually evolved by the impregnation of calcium (Fig 1) The patient is now eight years old

Recklinghausen's Disease (Neurofibromatosis) [5] —The skin lesions, molluscum fibrosum, consist of multiple flat or pedunculated, occasionally elephantiasic, tumors Moles and café au lait spots occur Elephantiasis of the eyelids may appear shortly after birth Neurinomatous changes occur in the ciliary nerves, sclera, cornea, uvea, and optic nerve Melanotic nodules may occur in the iris There is bone involvement in 70 per cent of the cases

A case with absence of the roof of the orbit due to a complete absence of both the greater and lesser wing of the sphenoid on the left side, as verified finally at autopsy, was followed for many years The pulsating exophthalmus present and the muscle paralysis seen have been described previously However, an attempt to study oscillatory tracings accompanying increased intracranial pressure, as occurs in deep respiration and coughing, was carried out and easily demonstrated these changes graphically (Fig 2)

Sturge-Weber's Disease—In 1879 Sturge showed that angiomatous changes can give rise to the simultaneous appearance of a nevus flammeus of the skin, glaucoma or buphthalmus, and epilepsy [6] In 1922 Weber demonstrated roentgenologically the presence of characteristic calcareous shadows in the brain in cases of this disease [7] Not only are angiomata of the choroid seen on the side of the angioma of the skin of the face, but studies with fluorescein indicate increased capillary permeability in the involved eye

Amino Acid Deficiencies

In studying the effect on the eye of individual amino acid deficiencies, it was found that valine produced a corneal dystrophy This change was reversible and disappeared after the administration of valine Two cases of exfoliative dermatitis with corneal changes similar to those seen in valine deficiency were observed At that time,

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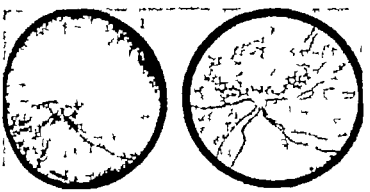


FIG. 1 Fundus picture seen at the age of eight months (left) and eight years (right)

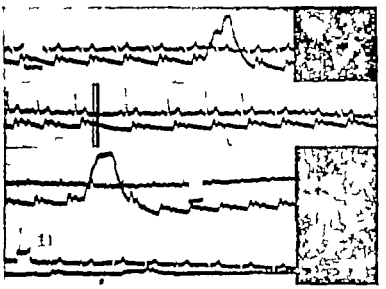


FIG 2. Graphic representation of pulsating exophthalmos at periods of increased intracranial pressure—*1*, effect of cough, *2*, effect of inspiration and expiration *3* effect of cough *1, 2 3*, on abnormal left eye, and *10* effect of cough on right extraocular pressure.

methods of determination of individual amino acid deficiency were not available Subsequent to the parenteral administration of amino acids, aminoids by mouth, and a high protein diet however the cornea began to clear and eventuated in complete clearing with restoration of 20/20 vision from 20/100 in the right eye and 20/40 in the left eye in one case In the second case, vision returned to normal from 20/50 in both eyes In both cases the total proteins were reduced, showing predominantly in the albumin fraction (total protein 4 9—albumin 2 9 globulin 2)

Acute Disseminated Lupus Erythematosus

Before this clinical syndrome is sufficiently well developed to permit diagnosis a fundus examination may lead the internist to the correct diagnosis Wagener has stated It seems possible that from more universal studies of the retina in these cases, a reasonably characteristic picture might evolve In my experience the toxic retinopathy is most frequently encountered Gross involvement of the retinal vessels is much less common.[7 8] Keil advanced the vascular concept of the disease.[9] He assumed the presence of a theoretic toxin that has a selective affinity for the vascular system, chiefly the capillaries Pathologically a peculiar hyaline thickening (wire loop) of the walls of the glomerular capillaries occurs Renal involvement occurs in practically every case.

In those cases where the retina showed involvement, the presence of some form of exudate was regularly found Prominently mentioned were cotton wool patches Kurz in 1938 was the first to demonstrate the true histology of the white patches in the retina namely varicosities of the nerve fiber layer.[10] He thought the lesions were identical with retinitis septica of Roth and considered them to be toxic in origin Maumenee confirmed the histologic findings in five cases of his own.[11]

In three cases that I have observed, the striate appearance of the exudates indicating the nerve fiber localization has been sufficiently impressive to lend diagnostic import in a less developed and less definite case Whereas the diagnosis depends chiefly on the cutaneous lesions occasionally no cutaneous lesions may be present.

Case 1—Such a case is M F a man aged thirty three (This fact is also unusual) His original complaint was of disturbance of vision and edema of the bulbar conjunctiva The symptoms had come on after being in the sun in Florida. He subsequently developed loss of appetite, nausea, and low grade fever followed by pronounced ascites hydrothorax and marked fluid accumulation in the pericardium His physician suspected acute lupus erythematosus and referred the patient for a fundus study Both retinas were filled with many exudates each of which had a striation, diagnostic of a nerve fiber localization With no attenuation of the retinal arterioles, only moderate kidney involvement and the above clinical picture it was my opinion that the fundus picture was compatible with and suggestive of lupus erythematosus. The latter diagnosis was confirmed by consultations. Eight months later a rash appeared on the cheek that the skin consultants felt was what we would expect in lupus erythematosus.

Although this case has not been confirmed by biopsy or autopsy the importance of fundus studies is stressed Other cases that have come to autopsy emphasize the need for bearing this diagnosis in mind when striate exudates in a patient with no hypertension or vessel attenuation are observed in a case of continued fever The aggravation of skin lesions by sunlight and sulfonamides lends further information leading to the diagnosis of acute lupus erythematosus.

Boeck's Sarcoid

This is a chronic, relatively benign disorder of unknown cause with particular predilection for the lymphatic tissue or the reticuloendothelial system The term sarcoid was adopted by Boeck in 1899 for lesions simulating sarcomas and leukemic conditions of the skin [12] He believed the condition to be one only of the skin Later he recognized his error The two main types of cutaneous lesions associated with the disease, the superficial and the deep, have a predilection for the face, the external surfaces of the arms, and the shoulders and the trunk, but may be found in other areas The superficial lesions are papular and nodular elevations varying in size from that of a pinhead to that of a pea They are sharply outlined, dark red, and may be surrounded by adherent scales The larger lesions are subcutaneous and nodular and have either faint or no surrounding erythema The eye is one of the favorite sites of the disease, and many patients first consult the ophthalmologist The most frequent lesion is an inflammation of the anterior portion of the uveal tract

Osseous changes in the hands and feet, disclosed on roentgen study, are practically pathognomonic A characteristic histologic picture, consisting of naked tubercles, collections of epithelioid cells interspersed with lymphocytes and occasional giant cells without caseation necrosis and tubercle bacilli, is found uniformly in every involved structure

Boeck's sarcoid is one of the possible causes of the Mickulicz syndrome, with involvement of the lacrimal glands and at times the salivary glands

Case 2 —A A , a Negro woman, age thirty-five, was seen at New York Post-Graduate Hospital Her chief complaint was generalized small nodules in the scalp Soon other nodules appeared in the upper lid, lower lip, and other parts of the body, varying from 1 to 4 mm in size and noninflammatory in type There was a diffuse swelling of the parotid glands and an enlargement of the palpebral portion of both lacrimal glands The orbital portion on the left side had a shotty feeling On everting the upper lid, a hyaline-like excrescence at the upper border of the tarsus could be seen The remainder of the ophthalmologic examination was negative General examination was negative except for an enlargement of the liver Tuberculin tests up to 1 100 mg (old tuberculin) were negative An x-ray of the chest showed diffuse reticular and miliary infiltration of the central lung fields, mainly toward the bases The heads of the several phalanges of both hands showed small cystic-like areas Biopsy of a nodule from the left forearm showed masses composed of epithelioid and giant cells No caseation and very little round cell infiltration was present

The importance of biopsy in suspected cases is emphasized

The argument as to whether the disease is really tuberculosis has not been decided Tubercle bacilli have been reported in cutaneous lesions, and at necropsy fresh tuberculosis processes have been found [13] Although this has not been the experience of the majority of investigators, the trend today is not to deny the possibility of sarcoid being a form of tuberculosis Leitner in 1946 reported eight cases of Boeck's sarcoid [14] In three of these there was a transition from benign granulomatosis to tuberculosis, and in four cases a negative tuberculin became positive The similarity between the clinical symptoms and the course of benign granulomatosis in a brother and sister suggests that the constitution plays an important part in the course of Boeck's disease The tuberculin test was slightly positive in the sister and negative in the brother The tuberculin reaction is to be considered, says Leitner, as an antigen-antibody reaction The negative tuberculin test may be the result of the fixation of the antibodies at the site of their production (the reticuloendothelial system) by the antigens of the Koch bacillus which are destroyed at the same site

Case 3 —E R , a fifteen-year-old white boy, complained of a lump on his left upper lid On everting the lid, a granulomatous pedunculated growth with a broad based pedicle was seen The left preauricular gland was enlarged His Mantoux reaction, 1 100,000, was positive Biopsy confirmed the diagnosis of sarcoid

A positive tuberculin does not exclude sarcoid but is in keeping with a trend of one school of thought—that of considering sarcoid a special type of tuberculosis

Recurrent Aphthous Uveitis with Mucocutaneous Lesions

This syndrome is characterized by periodically recurring uveitis and a group of mucous and cutaneous symptoms, namely, cutaneous eruptions of various types and aphthae and ulceration of the buccal and genital mucous membranes This disease seems to have been described as far back as 1772 by Janin de Combe Blanche, the French oculist [15] Behcet excluded the recurrent iritis and hypopyon and has described cases in which the conjuctiva was affected but no uveitis occurred (the so-called triple symptom complex) [16]

In such cases Francheschetti believes the disease is in an attenuated form [17]

The disease affects young people of both sexes The attacks are recurrent and periodic The lesions usually involve the skin or mucous membranes and later the ocular tissues Buccal

aphthae with or without submaxillary enlargement of the lymph nodes, recurrent aphthae on the genitalia or ulcerations on the scrotum and balanopreputial groove, sometimes accompanied by nonspecific urethritis, completes the picture The cutaneous lesions appear as erythema nodosum papulopustular erythema or pyoderma gangrenosum

The possibility of a virus infection has been considered but not yet proved

Urbanek felt the condition represented a hypersensitiveness to foreign proteins.[18] This condition is related to the pluriorificial ectodermosis of Fressinger and Rendu known in this country as Steven-Johnson disease in which our chairman called attention to the eye findings noted in erythema multiforme The similarities are as follows (1) cutaneous eruptions of the polymorphous type of erythema with aphthous stomatitis of an acute evolution in which the conjunctiva and cornea are involved and uveitis does not occur, and (2) generalized allergic reaction

Both diseases are not identical but there are similarities Whereas no one cause of these conditions has been definitely ascertained, in three cases of my own and a review of the literature where bacteriologic notations have been made of the conjunctival and intraocular flora after infection, only Staphylococcus aureus has been noted It is probably the reduced vitality of the tissues that allow this commonly present organism to attack both the eye and the skin as cultures of vesicles of the skin have also shown the constantly present S aureus to be the only cultivable bacteria. On occasion, however inclusion bodies have been recovered from the skin vesicles stained with victoria blue, especially by Thygeson.

Vogt Koyanagi Disease

The association of poliosis with an inflammatory change in the eyes, namely, sympathetic ophthalmia was first noted in 1873 by Schenkel [19] Hutchinson, twenty years later was the first to describe poliosis with bilateral iridocyclitis When there is a change in the air content, the whitening of the lashes may be sudden, and this fact explains the occurrence of canities overnight In such instances there is a complete absence of pigment in the hair shaft When a disturbance of pigment occurs less rapidly, the color is less distinctly white and a few granules may be seen between the cells of the hair shaft

Alopecia occurs in 53 per cent of cases, poliosis in 82 per cent vitiligo in 62 per cent, and dysacousia in 50 per cent of cases. Some observers conclude that nontraumatic bilateral uveitis accompanied by one or all of these symptoms should be regarded as Vogt-Koyanagi syndrome Duke-Elder states that Harada's disease in which one has a spontaneous bilateral retinal detachment which reattaches itself represents a milder form of the Vogt Koyanagi syndrome.[9]

Cutaneous testing with pigment shows a positive reaction similar to that seen in sympathetic ophthalmia in about one third of the cases All cases reported have been darkly pigmented individuals frequently Japanese and Italians

Case 4—E F, when first seen had faulty light projection in each eye His history told of bilateral uveitis of two years duration followed by complicating cataract and plastic iritis An interesting symptom was 'double hearing' and dizziness Three weeks following this alopecia occurred followed by canities and poliosis

Case 5—The case of F M a thirty year-old man ran the classic course of Harada's disease with bilateral retinal detachment which attached itself and bilateral uveitis with secondary glaucoma followed by poliosis. One eye fortunately retains normal vision after surgery and the second eye 20/100 vision with normal tension in each eye

Melanoma of the Skin with Intraocular and Orbital Metastases

It has been stated by Virchow that organs which are a frequent site of origin of primary cancer are prone not to have metastatic growths Although there are many exceptions to this statement, the rule seems to apply with peculiar force to the melanotic malignant growths of the eye Most of the melanomas of this organ are known to be primary in the choroid Only a few have been reported as metastasizing to the eye from other sites of origin. I have recently collected seven cases, including one of my own, which in a melanotic tumor arising in the skin produced intraocular metastases This patient gave a history of a painful "strawberry" mass appearing in the skin of the right posterior wall of the chest two years previously [21] The growth was excised surgically The patient remained in good health for eighteen months. Then, at the site of the previous operation another mass appeared followed by swelling in the axilla. Histologic examination showed metastatic malignant melanoma of the lymphatic nodes As part of a generalized metastasis the eye showed lesions in the iris ciliary body choroid, and orbit.

We concluded that although most melanotic tumors of the eye are primary the possibility should be borne in mind that they can be second ary and careful search made for other primary sites and evidence of multiple metastases.

Monocytic Leukemia

Three cases of monocytic leukemia were observed In each case the fundus showed preretinal hemorrhages associated with a low platelet count In one case hemorrhages from the nose and ears occurred as well as in the brain, the latter producing a papilledema At autopsy the posterior segments of the globes were obtained and showed the preretinal hemorrhages as well as the vessels filled with monocytes The possibility of this type of leukemia should be borne in mind with this type of hemorrhage in a case of leukemia

In the skin an eczema-like eruption may be the first symptom to which the patient's attention is called (Leukemia cutis) Occasionally, small tumors occur in the skin In some instances diffuse lymphatic hypertrophy with the formation in the lower part of the corium or subcutaneously of discrete or chainlike pea- to cherry-sized or larger, flattened nodules, occasionally resembling mycosis fungoides, occurs

Brucellosis

This is a disease of manifold symptoms The eye is one of the many sites of its manifestations In its acute or chronic form, brucellosis is second to no other disease in its ability to masquerade under invisible guises In 1939 Green published one of the earliest reports concerned exclusively with ocular manifestations in brucellosis [22] He reported four of his own cases and cited 28 others from the literature They included iritis, optic neuritis, choroiditis, uveitis, palsies of the ocular muscles, and retinitis

Harris, in a personal communication, stated, "In my own experience quite characteristic skin lesions appeared and disappeared along with other symptoms definitely attributable to brucellosis in 8 9 per cent of the first 247 cases tabulated"

The skin lesions fell into 12 main groups—often more than one type was present in the same patient

1 Macular, pink or red, scattered, itching lesions usually of the forehead, temple, cheeks, and occasionally the arms and trunk

2 Maculopapular or papular eruptions in small groups, anywhere in the body, often orange-red in color and occasionally with small central vesicle

3 Erysipelas-like lesions, usually in extremities, painful, tender, and accompanied by fever

4 Multiple patches of dusky, cyanotic, tender, painful nodules resembling erythema nodosum

5 Diffuse erythematous rash of entire body, high fever resembling scarlet fever

6 Scaly, reddish-brown, itching lesions, usually confined to arms and wrists, sometimes resembling psoriasis but lacking the typical scales

7 Crusting, seropurulent lesions, usually on arms and legs, somewhat resembling impetigo and perhaps due to secondary infection

8 Circinate and macular, pink, scaly lesions, closely resembling pityriasis rosea

9 Papular, maculopapular, and pustular contact dermatoses with distribution corresponding to exposed areas

10 Ulcerative dermatitis

11 Purpuric patches

12 Eczematous lesions and other unclassifiable skin conditions

Miscellaneous

For the sake of completeness, mention should be made of the following diseases that have associated eye and skin lesions

1 Pseudoxanthoma elasticum, associated with angioid streaks of the retina

2 Nutritional deficiencies, both avitaminosis and hypoproteinemia with its varied eye and skin manifestations

3 The recent recognition of German measles in the first months of pregnancy resulting in mothers giving birth to babies with congenital cataracts

4 Expression of syphilis in both the eye and skin

5 Cataract of neurodermatitis
   (*a*) That associated with scleroderma,
   (*b*) That associated with poikiloderma atrophicans vasculare (Rothmund's or Jacobi's Disease),
   (*c*) That associated with Darier's disease, erythema exudativa, Raynaud's disease, psoriasis, and other dermatogenous conditions Bellow states, "Whether the association is significant or merely fortuitous cannot be told with the limited cases reported" [23]

6 Ocular pemphigus with the more common pharyngeal involvement

7 Corneal involvement accompanying vaccinia, measles, or even variola

Conclusion

The association of ocular and dermatologic expressions of general disorders is sufficiently recognized today to stress the importance of a knowledge of both for the better recognition and handling of systemic disease

108 East 66th Street

Discussion

Rudolf L Baer, M D , *New York City*—Doctor

Givner has given a very complete review of the most important examples of dermatoses which are accompanied by manifestations in the eye I am quite certain that he could have extended this list considerably with many minor examples of associated dermatologic and ophthalmologic conditions However, it seems to me that considering the developmental relationship between eye and skin it is astonishing how relatively small a number of cases with severe eye complications actually occur in a large dermatologic material

What are the eye complications among the ten dermatoses which are most commonly seen in private dermatologic practice in New York City? There are three which affect the eyelids namely eczematous contact dermatitis, seborrheic dermatitis, and giant urticaria Fortunately these are conditions in which the involvement of the eyelids is not permanent, and there are no serious or lasting sequelae. However, in another one of the commonly seen dermatoses i e., atopic dermatitis (also called disseminated neurodermatitis or hay fever asthma eczema) the very rare complication of cataract formation occurs Because of this possible complication I believe that every case of persistent, severe atopic dermatitis should have eye examinations at regular intervals The type of cataracts seen in atopic dermatitis is sufficiently different from other cataracts to have been distinguished by the name "atopic cataract However I do not think that this name is justified since to my knowledge no similar cataract formation occurs in the other atopic diseases such as asthma and hay fever etc These cataracts develop in young people who have had atopic dermatitis for periods varying from one to twenty years

Some evidence has been cited in the literature which indicates that the cataracts tend to progress, particularly after a severe flare-up of the dermatitis It seems to me that, if this observation is correct the possibility exists that cataract formation may be stopped in those cases if the dermatitis can be cleared up In some of the most severe cases where this result cannot be effected by the usual forms of therapy available in New York a change of environment to a hot dry climate such as in New Mexico or Arizona, is often very beneficial This suggests that cases of atopic dermatitis with incipient cataracts should, whenever possible be sent to one of these climates where most cases of atopic dermatitis tend to clear up

After the occurrence of atopic dermatitis and cataract was noted some observers considered the possibility that roentgen radiation given to the skin of the face might be responsible for the cataracts, but this theory had to be abandoned as there have been quite a few cases of atopic dermatitis with cataracts who never received roentgen therapy. Furthermore this type of cataract formation does not occur in the many thousands of cases of acne vulgaris who have received roentgen ray therapy to the face

I was greatly interested in what Dr Givner had to say about eye changes in acute disseminated lupus erythematosus Has he observed any eye changes in the chronic discoid form of lupus erythematosus? There is no agreement among dermatologists as to whether lupus erythematosus of the acute disseminated form and of the chronic discoid form are related diseases or whether they are entirely separate entities Still it would be interesting to know whether eye changes are ever seen in the chronic discoid form

As to the sarcoid forms involving the eyes, I wonder whether Dr Givner has had any experience with Calciferol treatment This form of therapy which was first developed by the French and English for the treatment of lupus vulgaris, has been found effective in the treatment of some cases of sarcoid Concerning the diagnosis of sarcoid I would like to add that, in addition to the negative tuberculin tests (positive anergy) there is now available the Kveim test which according to many Scandinavian observers is thought to be quite specific for sarcoid disease

References

1 Bourneville, D M Arch. de neurol 1: 69 (1880)
2 Pelagatti, M Ann. de dermat. et syph. 5: 933 (1904)
3 Pringle, J J Brit J Dermat. 2 1 (Jan.) 1890.
4 Van der Hoeve J Arch. f Ophth. 105: 880 (1921)
5. Von Recklinghausen F : Uber die multiplen Fibrome der Haut und ihre Beziehung zu den multiplen Neuromen, Berlin A Hirschwald 1882, p. 1
6. Sturge W A.: Tr Clin. Soc. London 12: 162 (1879)
7 Weber F P J Neurol. & Psychopath. 3: 134 (Aug.) 1922.
8. Wagener H. P : Am. J M. Sc. 211 240 (Feb.) 1946
9 Kall H. Arch. Int. Med. 66 339 (Aug.) 1940
10 Kurz O : Ztschr f Augenh. 95: 315 (Sept.) 1938.
11. Maumenee A E. Am. J Ophth. 23: 971 (Sept.) 1940.
12. Boeck D : J Cutan. Dis. 17: 543 (Dec.) 1899
13. Kyrle J Arch f Dermat. u. Syph. 131: 33 (1921)
14. Leitner, S. J Schweiz Ztschr Tuberk. 3 103 (1946)
15. Janin de Combe Blanche, J : Memoires et observations anatomiques, physiologiques et physiques sur l oeil et sur les maladies qui affectent cet organe Lyon Freres Perisse, 1772.
16. Beheet, H. Dermatologica 81: 73 (Feb.) 1940
17 Franceschetti A. Arch Ophth. 35 469 (May) 1946.
18. Urbanek J Ztschr f Augenh. 79 145 (Dec.) 1932.
19 Bebenkl, A. Arch. f. Dermat. u. Syph. 3: 137 (1873)
20 Duke-Elder W S. Text Book of Ophthalmology St. Louis, C. V Mosby Co. 1941 vol. 3 p. 2365.
21. Lee, J R. and Givner I : Arch Ophth. 34: 422 (Nov Dec) 1945.
22 Green, J : Arch. Ophth. 21 51 (Jan.) 1939
23 Bellows J G.: Cataract and Anomalies of the Lens, St Louis, C. V Mosby Co. 1944 p. 476.

VOICE OF EXPERIENCE

My wife, who is also the mother of my six children ordinarily answers the telephone for me Recently a woman called up and asked if I were a doctor of medicine After my wife had assured her I was, the woman inquired hesitantly, 'Does the doctor practice that there birth control? Said my wife, who is never at a loss for words 'Not to my knowledge. —*Medical Economics July 1948*

NUTRITIONAL REQUIREMENTS IN CONVALESCENCE

HERBERT POLLACK, M D , and JOHN BOOKMAN, M D , New York City

(From the Metabolic Division of the Medical Services, Mt Sinai Hospital)

WHEN one uses the term "nutrition," the connotation is "malnutrition" The broad definition of this term is abnormal nutrition This means that starvation, emaciation, and obesity are all forms of malnutrition Malnutrition predisposes to poor health Public health surveys have shown that both obesity and undernutrition lead to greater incidence of diseases Obesity is associated with the greater frequency of degenerative conditions such as hypertension and arteriosclerosis Undernutrition is associated with the rapid spread and more virulent types of infectious diseases These facts have been well disseminated and will not be further discussed here

On the other hand, the influence of disease or injury on nutrition is less well known and appreciated The work to be reported here will deal largely with this aspect of the problem To review briefly, the factors involved are the adequacy or inadequacy of food intake for the conditions under which the patient is living By this is meant the actual intake of food by the patient It is not remiss to mention that frequently a perfectly adequate diet is prescribed by the physician and served to the patient Not infrequently, this diet is rejected by the patient, either wholly or in part The actual amount of food consumed and retained must be considered the intake The understanding of the requirements is important in determining the adequacy Most of the standard tables of food requirements are based on normal, healthy, ambulatory people The tables give caloric, protein, and vitamin requirements for the various age, sex, and work groups Some even mention a correction factor in total caloric requirements for fever The simple caloric allowance increase in fever or disease is incomplete and misleading All the specific metabolic requirements are increased This is especially true for protein, except in such conditions as typhoid fever and tuberculosis where the nitrogen requirement apparently does not change appreciably In contrast, pneumonia increases both caloric and protein needs

The protein requirements for the sick and wounded vary considerably from the normal There is usually a loss of protein from the body stores This loss can occur in two ways, and it is important to understand these two mechanisms which may operate simultaneously One is the mechanical loss of proteins through hemorrhage, exudates, and transudates, the classic example occurring in extensive burns The other large loss of nitrogen occurs in the so-called catabolic states The mechanism of this loss is not understood Thus, however, should not detract from the important and insidious nature of this process Here, there is a relatively large excretion of nitrogenous substance in the urine (principally urea) originating from the breakdown of body proteins One of the points we shall discuss is the concomitant phenomena of this protein breakdown and their influence on other nutritious requirements, more specifically the B vitamins

Even if an adequate diet is ingested and not vomited by the patient, there is the problem of absorption and digestion These have been discussed at length many times, and yet their importance prompts us to review them, in part, again and to present actual experimental data showing their far-reaching influence Absorptive failure is seen in those conditions where the bowel wall is diseased, such as lymphosarcoma and regional ileitis Surgical procedures which short circuit the bowel will decrease the surface available for absorption These facts have been observed clinically, so that we shall only present data illustrating the extent of these effects

The intermediary metabolism of the foodstuffs has not, as yet, been clearly outlined, and consequently the part it plays in the over-all metabolic picture also remains to be seen For example, the liver deaminizes the amino acids and synthesizes the carbohydrate fragments into fat The channels of these processes are poorly understood

The ultimate aim of the ingestion of food is its utilization by the body The term utilization, then, represents the end point of all the reactions previously mentioned The utilization is not confined to the currently ingested food but includes the stored food elements also In the presence of an inadequate intake, stores will be called upon to supply the difference between intake and the normal, as well as the abnormal, requirements

The mechanics of utilization, as well as the mechanics of the intermediary metabolism, are catalyzed by a series of enzymes In part, these enzymes are composed of combinations of the B vitamins and protein molecules Obviously, a

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failure of the enzyme system will result in a failure in utilization and, conversely a failure in utilization will result in a failure of the enzyme system Thus if the proper proteins are not made available, vitamin deficiency syndromes can appear in the presence of an adequate vitamin intake.

Case Reports

Case 1—C W , a woman aged thirty four was admitted with history of numerous food intolerances. During the course of a few years she had eliminated practically all the foods from her daily diet. Her weight on admission was 88 pounds, the previous normal having been 120 pounds The data shown in Fig 1 reveals that her intake on the ward was initially good Within three days however she reverted to former intake as reflected by decreased nitrogen intake and excretion By simple forced feeding the picture reversed itself and there was a gain of 2 Kg body weight in nine days

Case 2—In contrast is the patient Mrs B S a thirty four year-old woman, who had a history of regional ileitis with marked diarrhea for two and a half years. She had an ileosigmoidostomy involving practically all of the ileum, ascending, transverse and descending colon Subsequently, there was gradual weight loss and large frequent, copious bowel movements While she was on the metabolism ward studies were made. Charcoal markers appeared in the stool in from three to four hours. The fecal nitrogen averaged 7.5 Gm. every day This indicated a lack of absorptive surface and failure of utilization. She was then subjected to surgical procedure at which time the ileosigmoidostomy was closed and the ileum re-anastomosed, except for a short piece of terminal ileum which was left as a blind loop Following this procedure the patient was again studied on the metabolic ward There was indication of increased absorption as shown by decreased fecal and markedly increased urinary nitrogen excretion The fecal nitrogen did not, however, return to entirely normal levels (Fig 2) In spite of this evidence of increased absorption from the gastrointestinal tract there was little gain in weight and persistence of the manifestations of the deficiency syndrome in the tongue gums and lips Here now was evidence of failure of utilization The urinary studies showed adequate amounts of the B vitamins present. (Patient was given vitamin therapy parenterally and orally up to the time of the study) The high urinary levels of nitrogen excretion indicated a failure on the part of the body to retain nitrogen or go into a markedly positive nitrogen balance. Thus the simple mechanical restoration of the gastrointestinal tract did not restore the metabolic processes involved in utilization This patient illustrates the presence of a deficiency syndrome usually attributed to a vitamin deficiency in the presence of adequate vitamins, where the deficiency was in the protein anabolism.

Case 3—D F a fourteen-year-old boy was markedly underweight. There was a long history of asthma which had led to numerous diet restric

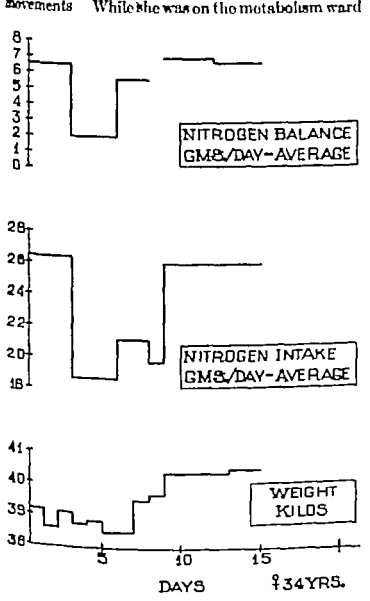


FIG 1

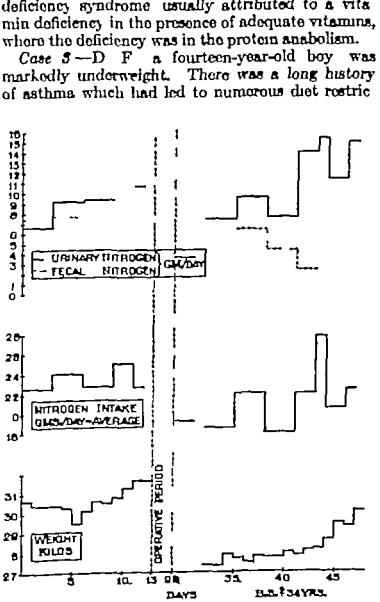


FIG 2.

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Case 2.—In contrast is the patient Mrs. B. B., a thirty four year-old woman, who had a history of regional ileitis with marked diarrhea for two and a half years. She had an ileosigmoidostomy involving practically all of the ileum, ascending, transverse and descending colon. Subsequently there was gradual weight loss and large, frequent copious bowel movements. While she was on the metabolism ward studies were made. Charcoal markers appeared in the stool in from three to four hours. The fecal nitrogen averaged 7.5 Gm. every day. This indicated a lack of absorptive surface and failure of utilization. She was then subjected to surgical procedure at which time the ileosigmoidostomy was closed and the ileum re-anastomosed, except for a short piece of terminal ileum which was left as a blind loop. Following this procedure, the patient was again studied on the metabolic ward. There was indication of increased absorption as shown by decreased fecal and markedly increased urinary nitrogen excretion. The fecal nitrogen did not however, return to entirely normal levels (Fig. 2). In spite of this evidence of increased absorption from the gastrointestinal tract there was little gain in weight and persistence of the manifestations of the deficiency syndrome in the tongue, gums and lips. Here, now was evidence of failure of utilization. The urinary studies showed adequate amounts of the B vitamins present. (Patient was given vitamin therapy parenterally and orally up to the time of the study.) The high urinary levels of nitrogen excretion indicated a failure on the part of the body to retain nitrogen or go into a markedly positive nitrogen balance. Thus the simple mechanical restoration of the gastrointestinal tract did not restore the metabolic processes involved in utilization. This patient illustrates the presence of a deficiency syndrome usually attributed to a vitamin deficiency in the presence of adequate vitamins where the deficiency was in the protein anabolism.

Case 3.—D. F., a fourteen-year-old boy was markedly underweight. There was a long history of asthma which had led to numerous diet restric-

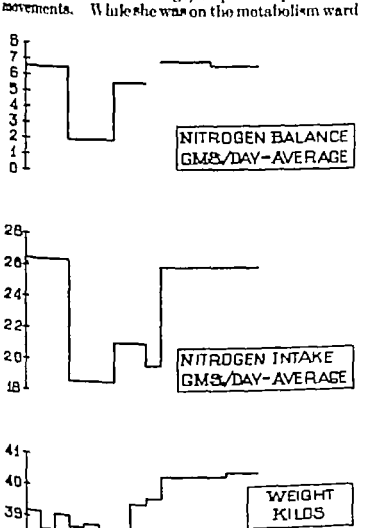


FIG. 1

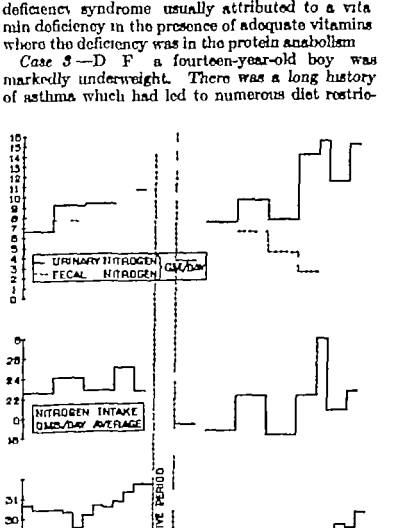


FIG. 2.

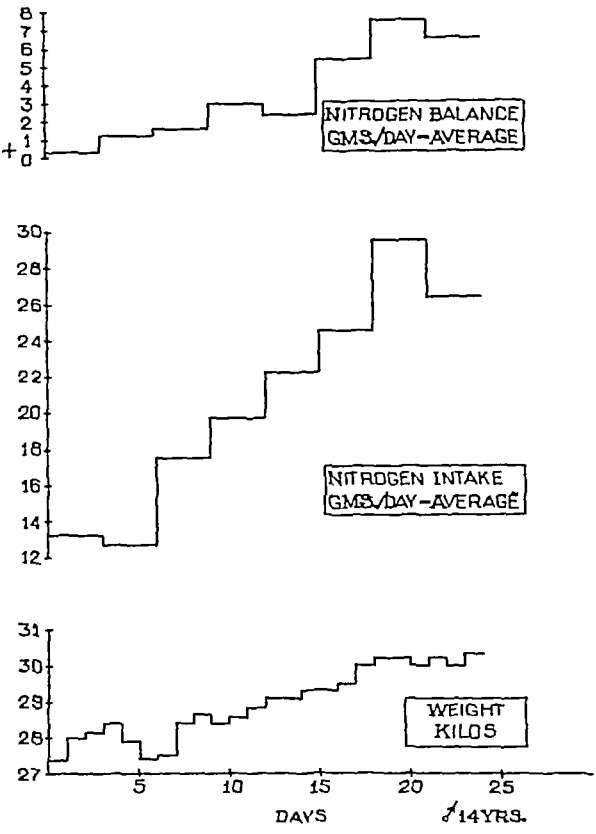


FIG 3

tions He was admitted for study of the type of *nutritive failure* Figure 3 shows that the only nutritive failure was the inadequacy of ingestion of nutrients The urinary nitrogen weight and nitrogen balance responded immediately and progressed to proper feeding The supplement was a skimmed milk powder with lactalbumin

Having established the fact that the nutritional requirements for the sick and injured are higher than for the normal person, one must look further into the causes of nutritional inadequacies What is most important, however, is the food that is offered to the patient and whether or not he is willing and able to accept it The basic nutritional requirements of the individual continue from day to day, increasing, as pointed out, during the catabolic periods and decreasing after long periods of semistarvation

The first two or three days postoperatively in any patient are usually very difficult ones The traditional liter or two of glucose supplies such a small part of the total nutritive requirements that the patient is obviously in a period of depletion of his reserves Too often the patient, because of his antecedent prolonged illness, has already drawn on these reserves and is in a period of real malnutrition when he needs optimum nutrition to insure his rapid convalescence and wound healing The conventional postoperative feeding schedules, illustrated in the tables, do not make a real effort to meet the current increased metabolic demands, much less replenish the depleted reserves (Tables 1 and 2) Actual calculations of feeding schedules, contrasted with the nutrional metabolic requirements, show that even if a patient ate all of the food presented during his first ten days he would still not meet his current requirements

These dietary inadequacies are not only common to the surgical patient but also to the medical patient Analyses of a conventional soft diet, the liberal Sippy diet, and the colitis diet reveal the *same* situation in these patients as in the *postoperative patient*

The Sippy diet analysis is represented in Table 3 The fundamental difficulty involved in securing optimal nutrition for sick, injured patierts dates back to the inadequate training which medical students receive in the translation of the

TABLE 1 —SURGERY PATIENT

	Calories	Protein (Gm.)	Thiamine (Mg)	Riboflavin (Mg)	Niacin (Mg)	Ascorbic Acid (Mg)
Average daily requirements	2 500	160	1 2	1 6	12	75
1st day						
Intake	400					
Depletion	2 100	160	1 2	1 6	12	75
Cumulative intake—12 00 MIDNIGHT, 2nd day	565	8				
3rd day						
Cumulative requirements	7 500	480	3 6	4 8	36	225
Intake	255	3	0 1	0 1	1 1	
Cumulative depletion	6 680	468	3 5	4 7	35	225

TABLE 2 —CONVENTIONAL SURGICAL PATIENT

	Calories	Protein (Gm.)	Thiamine (Mg)	Riboflavin (Mg)	Niacin (Mg)	Ascorbic Acid (Mg)
Cumulative minimum requirements (10th day)	25 000	1 600	12	16	120	750
Cumulative intake—12 00 MIDNIGHT 9th day	10 363	397	5 7	14 7	40 4	450
Intake—10th day	2 722	98	1 4	2 4	17 1	158
Cumulative depletion*	11 915	1 104	4 9	1 1	62 5	142

* Equivalent body weight loss was 4¼ pounds water loss 3 pounds, and observed weight loss approximately 7 pounds

TABLE 3.—PEPTIC ULCER PATIENT

	Calories	Protein (Gm.)	Thiamine (Mg.)	Riboflavin (Mg.)	Niacin (Mg.)	Ascorbic Acid (Mg.)
Average daily requirement	3 000	120	1 5	2	15	75
7th day (cumulative)						
Requirements	21 000	1 1 0	10 5	14	105	5.5
Intake	17 920	403	4 7	20 4	13 4	56
Depletion	3 080	717	5 8	6 4	91 6	469
16th day (cumulative)						
Requirements	30 000	1 600	15	20	150	750
Intake	24 675	631	8 2	20 5	32 7	140
Depletion	5 375	969	6 8	9 5	117 3	610
30th day (cumulative)						
Requirements	240 000	9 000	117	156	1 170	6 750
Intake	217 875	7,846	108 2	321 3	555 1	3 020
Depletion	22 175	1 154	8 8	165 3	614 9	3 730
31st day						
Average daily requirements reduced to	2,500	90	1 2	1 6	12	75

principles of nutrition to food as eaten The attending physician must be constantly aware of the nutritional status of his patient He should know when anorexia becomes a problem and when it interferes with the patient's progress The physician is charged with the responsibility of teaching the patient the family, and the nurse what he is trying to accomplish and how best to meet the situation It is the physician's and surgeon's responsibility to keep abreast of the progress in this field of nutrition as well as the technical, surgical, and chemotherapeutic discoveries.

In the hospital, the dieticians can be used to greater advantage than is currently appreciated by the administrative heads of these institutions The emphasis is wrongly placed in many hospitals at present The dietician is forced to add columns of figures instead of being allowed to emphasize the clinical aspects of her profession She must spend more time with the patient She must look at food from the patient's point of view and must be aggressive in her handling of the anorexic patient

Where highly trained dietetic personnel are not available, then the duties of the nursing staff must be enlarged to embrace this field In the large city hospitals the floor nurse is perhaps the only person who has constant supervision and intimate acquaintance with the patients She will know whether the patient is refusing an appreciable amount of the food offered on his tray The nurse must be educated to retailing this information to the house staff The house staff must learn to have a sympathetic and inquiring manner for this information The ultimate responsibility is, of course the attending physician's, since it is his actions and attitudes that guide the house staff

This work was supported in part by grants-in-aid from the New York Foundation the American Dry Milk Institute the National Poultry and Egg Board, and E R. Squibb and Company

MALE HORMONE THERAPY

Within a decade the application of male hormone therapy to gynecology and other special branches of medicine has assumed a position of paramount importance New forms of treatment come and go with bewildering rapidity but the permanence of this therapy remains without question Its benefits, however, are by no means unalloyed and it is sometimes difficult to steer between the Scylla of relieving distressing hyperestrogenic conditions and the Charybdis of masculinisation resulting from treatment But a *via media* can be found Male hormone therapy can be advised in all forms of hyperestrinemia in adult life When used in younger women it should be only a very temporary form of therapy and the dosage must be moderate. Minute doses of male hormone stimulate femininity, moderate doses depress, and massive doses completely antagonize it.

Androgen therapy in breast cancer cannot up to now be regarded as a cure, but it is certainly helpful for the bone metastases and pain It remains to be seen whether or not it will have any value as a postoperative prophylactic.—*Alfred A Loeser M.D., Obstetrical and Gynecological Survey, June, 1948*

POSTOPERATIVE IRIDOCYCLITIS

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(From the Departments of Ophthalmology of the University of Rochester, School of Medicine and Dentistry, and the Rochester General Hospital)

THE incidence of iridocyclitis following intraocular surgery obviously indicates a causal relationship between the surgery and the iridocyclitis The purpose of this discussion is to review the mechanisms by which surgical interference can provoke intraocular inflammations

It is essential first to examine the nature of the stimuli which produce inflammation in general In the last analysis these stimuli must be biologically active chemical factors The principal source of these chemicals (histamine-like substances or leukotaxine as described by Menkin) is the injured or destroyed cell [1] Cellular injury may well be the final common path of action by means of which an inflammatory response is elicited by such various agents as traumatization, thermal and radiant energy effects, and bacterial toxins and other poisons However, since the nature of the inflammatory response corresponds in some respects with the various injuring agents, factors other than tissue injury alone are obviously of significance. Moreover, some allergic reactions show a marked disproportion between the amount of apparent tissue injury and the degree of inflammation

For the purpose of this discussion it is convenient to classify the general sources of inflammatory stimuli as (1) traumatic injury, (2) bacterial toxins, and (3) allergic states

It is much more difficult to make generalizations about the nature of the stimuli which control the processes of repair Repair processes are usually intermingled with those of inflammation but are thought of as relatively distinct, these include the growth of new blood vessels, fibroblastic proliferation, and multiplication of the cells of the particular tissues interrupted, in various degrees The stimuli responsible for these activities are recognizable as growth-controlling mechanisms, about which so much remains to be learned While qualitative differences evidently exist between the factors controlling repair and those controlling inflammation, there may be some overlapping, in that injured or destroyed tissue appears to act as a stimulus for both processes Also, both inflammation and repair may require the integrity of the nervous system for their orderly behavior

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With this background in mind, the concept of post-traumatic intraocular inflammation should first be examined Post-traumatic iridocyclitis is considered here as that resembling a sort of concussion effect The pathologic course of concussion iridocyclitis may be reconstructed as follows the impact received by the eye is severe enough to cause multiple tears in the iris, ciliary body, choroid, retina, lens, sclera, etc Some of the tears involve capillaries and larger blood vessels, and interstitial hemorrhages in various degrees occur The vascular defects and the pressure of the escaped blood may result in focal areas of ischemia, so that previously undamaged cells are consequently unable to survive Thus, a significant amount of tissue is injured or destroyed, both by the actual injury and by secondary effects on cellular metabolism Since injured tissue is a stimulus to inflammation, it is not surprising that a post-traumatic iridocyclitis often occurs If the damage involves particularly the posterior segment, the clinical picture of traumatic chorioretinitis results, and this differs only in location from post-traumatic concussion iridocyclitis

How much of this concept of post-traumatic concussion iridocyclitis can be implicated in the etiology of postoperative iridocyclitis? Certainly, if it is true that destroyed and decaying tissue is an adequate stimulus for inflammation, then the more tissue destroyed as a result of operation, the more likely is the postoperative course to be stormy It is, therefore, well to consider that the degree of crushing, tearing, and cutting could significantly affect the postoperative course Important amounts of tearing could be sustained by the ciliary body when resistant zonules are tugged upon, and, if such tears include capillaries, the factor of interstitial hemorrhage is added In the same way undue traction on the iris could give rise to significant tears Destruction of corneal tissue could provide another source of similar stimuli On the whole, however, the type of changes described as concussion iridocyclitis should not be a large factor in operations They could be an important factor in the high incidence of iridocyclitis after penetrating trauma

The presence of exposed lens cortex is a second postoperative situation which should be examined as a source of inflammatory stimuli The mechanisms whereby lens protein may initiate inflammation include the three principal types al-



FIG. 1 Invasion of ruptured lens capsule with inflammatory cells



FIG 3 Degenerating lens cortex after rupture of the capsule exhibiting practically no inflammatory response although a proliferative reaction from the iris is present

ready outlined the inherent toxicity of degenerating tissue, irritating bacterial products, and allergic reactions For each of these situations peculiarities exist in the eye which strongly influence the inflammatory reactions

First, as a source of degenerating tissue, wounds of the lens capsule are unique When the lens capsule is cut, there is destroyed not only the tissue in the actual path of the instrument but the entire contents of the capsule The fact that such wounds do not lead invariably to important degrees of inflammation argues that degenerating lens substance is a weak inflammatory stimulant or becomes denatured so slowly that effective concentrations of inflammatory stimulants fail to build up The conflicting evidence as to the toxicity of lens protein is well summarized by Bellows.[3] It is reasonable to regard lens substance unprotected by the intact capsule as a potential inflammatory agent. Figures 1 and 2 illustrate reactions to lens substance by inflammatory cells

Since injured or destroyed tissue may be one of the factors affecting repair as well as inflammation it is not surprising that active fibroblastic responses are seen in conjunction with postoperative or post traumatic iridocyclitis where large amounts of lens cortex are present The proportions of the two processes may vary Figure 3 shows a lens injury with practically no inflammatory response but with a delicate fibroblastic outgrowth from the adjacent iris. Figure 4 shows an intense fibroblastic response and a moderate inflammatory response late in the course of a through and through injury to the lens

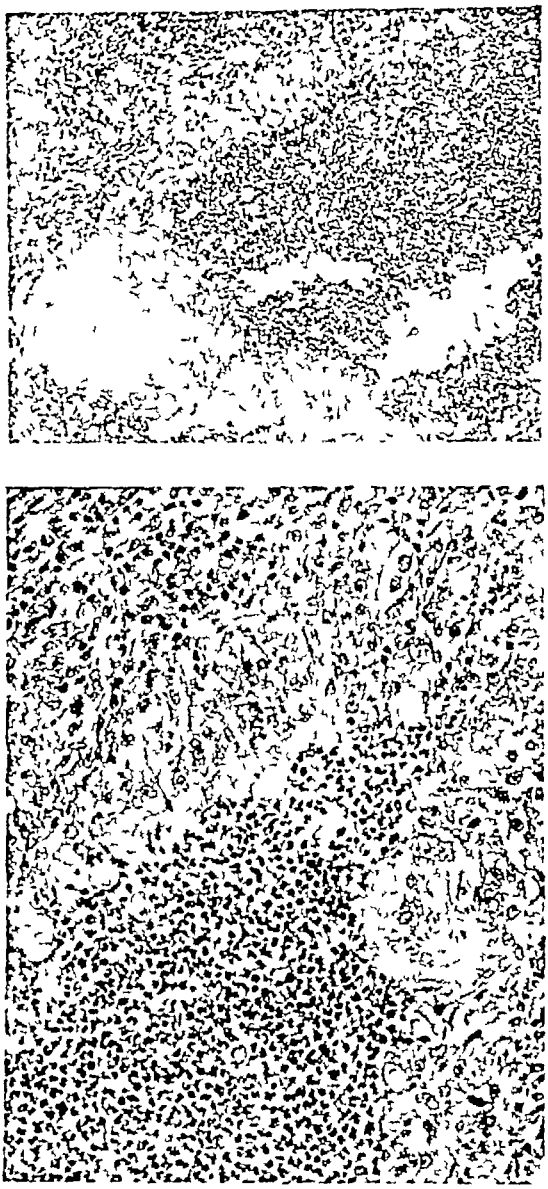
The second mechanism, whereby lenticular remains may provoke an iridocyclitis, lies in the peculiar susceptibility of the lens to bacterial invasion Lens substance is a good culture medium for bacteria and at the same time is relatively defenseless Obvious lens abscesses are not an un



FIG 2. Inflammatory reaction to degenerating lens cortex which is being invaded by lymphocytes and large mononuclear phagocytes



FIG 4 Moderate inflammatory reaction and severe proliferative reaction to a transfixing wound of the lens



FIGS 5 and 6 A lens abscess associated with a granulomatous type of inflammatory response

common pathologic finding, especially after perforating injuries However, the term iridocyclitis is not applied to the purulent bacterial intraocular inflammations Nevertheless, it is probable that infection of the lens or its remains with relatively avirulent organisms can produce the clinical and histologic findings of an iridocyclitis

The third mechanism, whereby inflammatory stimulants may arise from the lens, is by the development of an allergic state The fact that the lens is immunologically organ-specific is the basic ocular peculiarity which sets the stage for such an event, that is, the sensitization of the eye to lens protein with the eventual development of a vigorous inflammatory reaction The frequency of this complication is discussed by Hughes and Owens [3] These authors compiled data of their own and other observers which showed that intradermal skin tests with extracts of lens protein were positive in 75 per cent of cases of extracapsular cataract extraction with postoperative iridocyclitis and positive in 11 per cent of such cases uncomplicated by postoperative iridocyclitis

It is notoriously difficult to sensitize the eyes of experimental animals to lens protein This has been done most successfully by Burky where lens protein and a bacterial toxin have been simultaneously used as antigens [4] Figures 5 and 6 illustrate the association of a lens abscess with a severe granulomatous type of inflammatory reaction In this instance, the unusual severity of the granulomatous reaction may arise from the simultaneous effects of the bacterial growth and the rapidly degenerating lens protein, duplicating Burky's combination Some observers have suggested that a granulomatous inflammation may connote an allergic state, although this is not universally accepted [5] The findings in phaco-anaphylaxis described by Verhoeff and Lemoine do not include a granulomatous reaction [6]

In addition to tissue injury and lenticular remains, intraocular hemorrhage may provide a third source of postoperative inflammatory stimuli Blood outside of blood vessels is often moderately irritating The degenerating products of red cells and other blood constituents, like those of other tissues, are handled by an inflammation which varies in degree with the amounts of associated irritants Extravascular blood within the eye, especially where other stimulants to inflammation are present, can be considered as a factor influencing the severity of the inflammatory process The anterior chamber of the eye appears to embody a special mechanism for the rapid absorption of blood However, when this mechanism is rendered ineffective, especially in the presence of severe degrees of trauma, organization of the hemorrhage by infiltration of fibrous tissue can occur The resulting intraocular scar tissue is usually disastrous Thus, the fact that hemorrhage may act as a stimulus to the process of repair may exceed in importance its stimulus on the process of inflammation In Fig 7, an anterior chamber hemorrhage is being replaced by newly forming fibrous tissue but with minimal inflammatory reaction

One of the proved causes of an increased incidence of postoperative iridocyclitis is loss of vitreous What may be the reason for this? There is little reason to believe that vitreous in the anterior chamber is intrinsically an irritant The pro-



FIG. 7 Organizing anterior chamber hemorrhage with mild inflammatory reaction

teins of the vitreous are so small in amount and in such a chemically stable state that it seems unlikely, even if the hyaloid face is broken after cataract extraction and intermingled with aqueous that this traumatization of the vitreous would in itself lead to the liberation of any significant amounts of toxic material Thus is substantiated by the relative impunity with which vitreous can be withdrawn from one eye and inserted into another, even of another individual [7] Therefore other speculations might be developed

One explanation for the relation between loss of vitreous and iridocyclitis may be found in the fact that vitreous may interfere with the rapid and solid healing of the wound In the immediate postoperative period, the presence of vitreous could prevent approximation of the lips of the wound The larger the gap between the margins of the wound, the greater the inflammatory reaction would be produced because the debris, fibrin hemoglobin and inflammatory cellular residue which initially fill this gap will provide increased amounts of the factors which initiate inflammation Also vitreous may carry into the wound margins of iris or lens capsule, if extracapsular cataract extraction, and these may delay healing and consequently prolong inflammation or as stresses occur on the imperfectly sealed wound, microscopic hemorrhages which themselves contribute to inflammation may occur in the wound Figure 8 illustrates a gaping wound associated with inflammatory and proliferative reactions.

There are a few other conceivable sources of postoperative irritations which could lead to inflammatory responses and these are mentioned for the sake of completeness. One of these is the possibility of interference with the nerve supply trophic changes and tissue destruction are an occasional effect of denervation and perhaps this effect occurs within the eye Conversely, irritation of nerves by traction or compression on the part of fibrous tissue might evoke an inflammatory response of neurogenic origin An intraocular foreign body is another source of postoperative iridocyclitis Finally the possibility of a virus infection and/or the development of a hypersensitive state to uveal pigment may account for some instances of iridocyclitis as has been suggested in the case of sympathetic ophthalmia

In searching for the mechanisms whereby the effects of operation may lead to postoperative inflammatory states, one last possibility deserves mention Operation may touch off an iridocyclitis for which the stage has been set by previous events and which might otherwise have remained subclinical In other words, the trauma of operation may act merely as a precipitating and localizing stimulus for a kind of inflammation that is usually spontaneous

Summary

The pathogenic mechanisms by means of which intraocular surgery may evoke postoperative iridocyclitis are discussed Factors listed as possible stimulants to postoperative inflammations include tissue traumatization lenticular remains intraocular hemorrhage loss of vitreous neurotrophic effects low-grade bacterial infection, virus infection intraocular foreign bodies, and allergic reactions to uveal pigment.

Discussion

Searle B Marlow M.D *Syracuse*—Dr Snell has presented a picture of postoperative iridocyclitis which involves a number of considerations the relative importance of which is hard to evaluate The incidence of postoperative iridocyclitis varies



FIG 8. Inflammatory and proliferative reactions between the separated margins of a corneal wound.

THE INTRAPERITONEAL USE OF STREPTOMYCIN

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ALTHOUGH a great deal of literature has appeared on the systemic or parenteral use of the antibiotics, very little has been written in the last year on the topical administration or the intraperitoneal use of streptomycin A survey of the current medical journals reveals that the U S Public Health Service and the U S Army Medical Corps are responsible for a considerable amount of the literature As late as March, 1948, two reports on the topical use of streptomycin have appeared E L Howes reported in the *American Journal of Medicine*, May, 1947, the topical administration of streptomycin, alone and in combination with penicillin and sulfamylon The March issue of the *Canadian Medical Association Journal* includes an article by H S Morton, who employed streptomycin topically in a case of appendicial abscess with creditably good results

Observers of the parenteral method of administration are many, and they have stated that the results are satisfactory in peritonitis cases In the reports, however, there appeared to be an undertone of a lack of appreciation of its value Many will recall the intraperitoneal use of the sulfonamides and the early glowing reports This knowledge led the writer to use streptomycin intraperitoneally in a severely contaminated surgical procedure with a result so satisfactory that the antibiotics have been used repeatedly in other badly contaminated abdominal surgical cases with results so unexpected that the case histories are being presented

It is a well-known fact that the antibiotics are distributed to the peritoneal fluids and to fluids of other serous cavities However, it is not known whether the antibiotics pass through the natural protective barriers set up by the defense mechanism of the body tissues Therefore, the idea of using streptomycin topically occurred to the writer when the first of a series of severely contaminated surgical cases presented itself for treatment

Case Reports

Case 1 —M B , a forty-four-year-old woman, was admitted to the Lutheran Hospital on November 26, 1947, and discharged on January 31, 1948 Her chief complaint was intermittent abdominal pain with vomiting of twenty-four hours duration There was no history of diarrhea or constipation, and there had been no previous hospitalization or operative procedures She presented the appearance of a fairly well-developed woman who was in no apparent distress Temperature on admission was 100 4 F and pulse 86 The abdomen appeared flat There was no tenderness or rigidity, and no scars were visible, there were no palpable masses present X-ray examination showed dilated jejunal loops in the left upper quadrant A diagnosis of small bowel obstruction was considered The urine was essentially negative The blood studies showed a white blood count of 12,500 with a differential count of 88 per cent polymorphonuclears

Five days after admission patient's abdomen became markedly distended, and an emergency exploratory laparotomy was performed A band of adhesions was found which constricted the terminal ileum approximately 3 inches from the ileocecal junction The bowel at this point had become gangrenous, and in freeing the adhesion the contents of the small intestine contaminated the peritoneal cavity An ileostomy was performed The peritoneal cavity was aspirated of the contaminating intestinal contents Sulfathiazole powder together with 1,000,000 units of penicillin and 1 Gm. of streptomycin were introduced into the peritoneal cavity The abdomen was closed in layers around the ileostomy tube and patient returned to bed

Following a stormy postoperative period during which there was a breakdown in the wound healing and the formation of an intestinal fistula, the patient was prepared for a short circuiting operation On January 16, 1948, through a left rectus incision, an ileotransverse colostomy was performed, and the terminal ileum was excluded Again streptomycin powder was introduced into the peritoneal cavity The patient's postoperative course was uneventful Both abdominal wounds healed rapidly

Case 2 —S L , a twenty-six-year-old man, was admitted to the hospital on March 3, 1948, and discharged on March 27, 1948 His chief complaint was pain in the right lower quadrant of ten days duration He had been complaining of vague abdominal pain localized to the right lower quadrant and flank, associated with nausea but no vomiting He was admitted to the hospital for a genitourinary examination and was afebrile during this period On March 11, eight days after admission, he had a severe chill, temperature rising to 103 F A large palpable mass was present in the right lower quadrant A diagnosis of acute appendicitis with abscess formation was made Through a McBurney incision an edematous, inflamed cecum and appendix were found The appendix was removed One gram of streptomycin powder was placed in the peritoneal cavity and the wound closed in layers around a cigarette drain The patient's postoperative recovery was smooth and uneventful

Case 3 —T C , an eighty-three-year-old woman, was admitted on March 26, 1948, complaining of

severe abdominal pain and constipation of several days duration Cathartics and enemata were ineffectual On examination the abdomen was found to be markedly distended X-ray studies of the abdomen revealed fluid levels The blood was essentially normal except for a high leukocyte count She was prepared for operation and through a right rectus incision distended loops of small and large bowel were found. A constricting carcinoma of the sigmoid was also present A cecostomy was performed, during which procedure the abdominal cavity was contaminated One gram of streptomycin powder and penicillin were introduced in the peritoneal cavity The pelvis was drained through a cigarette drain, and the cecostomy tube was brought out through a McBurney incision

The postoperative course was stormy Three weeks following her first operation, an attempt was made to remove the carcinoma of the sigmoid through a low left rectus incision Because of the patient's general condition a first stage Mikulicz type of operation was performed One gram of streptomycin powder was introduced into the peritoneal cavity and the wound closed around the double-barreled colostomy

Patient's convalescence was uninterrupted until May 4 when she developed a cerebral complication from which she died

Case 4.—K. S., a forty-eight year-old woman was admitted on March 13 1948, and discharged on March 30 1948 Her chief complaint was general and abdominal pain with nausea and vomiting The admission diagnosis was acute appendicitis with peritonitis Temperature on admission was 102 F., and pulse was 80 The blood count showed a leukocytosis of 19,000 with a differential count of 82 per cent polymorphonuclears and 18 per cent lymphocytes Her abdomen was distended and tender throughout especially over the lower abdomen. Through a low right rectus incision the abdomen was explored and a gangrenous ruptured appendix found in the pelvis The diseased appendix was removed One gram of streptomycin was introduced into the peritoneal cavity and the wound closed around drains The postoperative course was smooth The wound healed firmly and the patient was discharged seventeen days postoperatively

Case 5.—M. D., a fifty five-year-old well-developed man was admitted on March 30 1948 and discharged on April 10 1948 He complained of severe, persistent vomiting The temperature on admission was normal The blood count showed a high leukocytosis of 18,000 with 84 per cent polymorphonuclears and 16 per cent lymphocytes The patient was prepared for operation and through a McBurney incision a gangrenous appendix lying in the right lumbar gutter was removed One gram of streptomycin was introduced in the peritoneal cavity and the wound closed around a cigarette drain Patient's postoperative period was uneventful and he was discharged on the tenth postoperative day

Case 6.—A. P., a fifty-seven-year-old man, was admitted on April 9 1948, and discharged on April 21 1948 He complained of severe lower abdominal pain of twenty four hours duration. Examination revealed a well-developed man with distention and and tenderness over the lower abdomen The white count showed a leukocytosis of 8,500 with 83 per cent polymorphonuclears and 17 per cent lymphocytes. Temperature on admission was 102 F The abdomen was explored through a low right rectus incision and a gangrenous appendix with spreading peritonitis found The appendix was removed One gram of streptomycin powder was placed in the peritoneal cavity and the wound closed around a cigarette drain The postoperative course was smooth and patient was discharged on the twelfth postoperative day

Case 7.—M. C., a fifty-seven year-old man, was admitted on February 4 1948, and discharged on February 28 1948 The diagnosis on admission was carcinoma of the rectum biopsy revealed this to be an adenocarcinoma. He was prepared for a one-stage abdominoperineal resection of the rectum Through a low left rectus incision the sigmoid was divided between clamps and a left inguinal colostomy was performed The distal end of the sigmoid and rectum were mobilized and a new pelvic floor constructed One gram of streptomycin powder was introduced in the peritoneal cavity and the abdomen closed in layers The lower end of the rectum and sigmoid were then removed through a perineal wound and the pelvic space drained with a Mikulicz type of drain The patient's postoperative course was slow but uneventful, and the patient was discharged on the twenty fourth postoperative day

Summary and Conclusions

Seven abdominal surgical cases are presented in which there had been contamination of the peritoneum The intraperitoneal use of streptomycin either alone or in combination proved efficacious in the control or spread of peritonitis

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BUSY BODY

The young woman who entered the pediatric clinic with a small baby complained that the child was taking his breast feeding poorly Our professor thought the case of sufficient interest to call in the entire section He asked the young woman to undress so that each of us—eight in all—could palpate her breasts, noting how underdeveloped and nodular they were After we had finished, he explained to her the course she must follow to improve lactation Only then did she volunteer the information that the child was not hers, but her sister's.—*Medical Economics July 1948*

HYDROLYZED ORAL HAY FEVER ANTIGENS

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(From the Kings County Hospital and the Long Island College of Medicine)

ORAL treatment of hay fever with pollen extracts has been employed since 1922 Satisfatory clinical results have been reported by several investigators However, large doses of raw pollens have caused gastrointestinal irritation in sensitive patients In such cases the dose that can be tolerated is likely to be below the effective level

This report relates to a process of pollen hydrolysis which permits oral administration in high dosage without any gastrointestinal reaction Various pollens so treated have been given in doses as high as 150 mg to a series of 250 known sensitive patients without a single gastrointestinal upset Therapeutic results compared favorably with injected antigens

Allergic rhinitis was not recognized as a distinct entity until the nineteenth century When first described, hay fever was thought to be due to the sun Later, it was attributed to the aroma from blooming grasses

The first to associate hay fever with pollen was Elliotson From that time on, the disease was attributed to airborne materials, although some physicians still would not subscribe to the idea that pollen was the cause These men were, to some extent, confused by the nature of the various types of allergies Dust, decayed vegetable matter, wind, and heat all came in for a period of blame

It was not until Blackley conducted experiments with fresh and dried pollens from a wide variety of plants that scientific proof of the cause of hay fever was established [1] Blackley made extracts of pollens for subcutaneous injections He also catalogued the various pollens according to their importance in causing hay fever Pollen counts were made at various altitudes

Oral Pollen Therapy

Attempts to relieve hay fever by oral administration of the responsible pollens go back a quarter of a century As long ago as 1922, Touart treated hay fever by ingestion of phenyl salicylate coated tablets containing 0 1 mg of pollen protein [2] Those patients who were sensitive to grass pollen obtained relief A small percentage of sensitive patients improved after treatment with ragweed antigen

The presence of ragweed antigen in the blood and urine after oral ingestion of ragweed pollen extracts was demonstrated by Black [3] He subsequently used oral therapy in a number of sensitive patients and was successful in relieving 80 per cent of those patients who were grass- or ragweed-sensitive [4] Over 75 per cent of the pollen-asthma, orally treated patients showed successful results Thommen cited a satisfactory result in a case with oral pollen therapy [1] He mentioned the variability of absorption after oral administration

Urbach succeeded in alleviating the symptoms of a man who was sensitive to the pollen of the horse-chestnut tree by oral use of pollen peptides of the horse-chestnut [5] Later he reported similar results by the use of peptides made from the entire pollinating flowers [6]

In 1933 Gatterdam reported on oral pollen therapy [7] He elaborated his subject later with a series of 85 hay fever patients treated with pollen orally [8] Eighty per cent were markedly relieved

Bernstein and Kirsner showed that peptic digestion of ragweed pollen (either whole or as an extract) does not destroy its activity [9] This is important as it indicates that pollen may be given by mouth without destruction by the gastric juices

Stier and Hollister observed 383 cases over a period of three years and found that the oral administration of pollen extracts gave about the same results as the hypodermic method [10] They emphasized the ease of administration and wider margin of safety

Hydrolyzed Oral Antigens

When large doses of raw pollen are given to sensitive patients, many will develop symptoms of gastrointestinal irritation When the dose is reduced below the point where gastrointestinal irritation occurs, the dosage level is below the effective level

This difficulty has now been overcome For high dosage, a process of hydrolysis has effectively changed pollen so that in a series of 250 sensitive patients doses as high as 150 mg (150,000 micrograms) have not produced symptoms of gastrointestinal upset in any case

A mixture of hydrolyzed pollens that has been found effective in the great majority of cases is stated in the following formula

Mixed giant and short ragweed, 1,000 Gm (Ambrosia trifida and A elatior)
Orchard grass, 100 Gm (Dactylis glomerata)

Timothy, 100 Gm (Phleum pratense)
Goldenrod, 10 Gm (Solidago)
Pin Oak, 20 Gm (Quercus palustris)
Rye 10 Gm (Secale cereale)

In our studies we also included one pollen of the Chenopodium group such as Botrys (Jerusalem oak), Amaranthus such as spinosus (spiny amaranth), Artemisia such as annua (annual wormwood or sweet mugwort), cultivated aster perennial rye grass (lolium perenne) and Ailanthus (tree of heaven) Approximately 1 Gm of each of the above pollens was included

Regulation of Dosage

For our clinical studies the hydrolyzed pollens were mixed in the proportions mentioned above and divided into tablets containing 10 mg each plus ordinary excipients The 10-mg tablet may be taken as a test dose If no untoward symptoms develop the dose may be increased daily by one tablet per day to a maximum of ten The usual dose is two tablets three times a day

Discussion

Injection therapy has been successful in the treatment of allergic rhinitis and hay fever Due to the increasing use of protein substances for immunization against diseases such as diphtheria and tetanus and the injection of pollen preparations themselves, there is an increasing incidence of sensitivity which interferes with the subsequent use of allergins by hypodermic injection.

In certain individuals symptoms such as vomiting and syncope, occur following the use of hypodermic injections of allergins and other protein-containing media For this reason if a patient is affected with a heart lesion or other serious disease, there has been a reluctance on the part of physicians to administer allergins hypodermically In addition raw oral preparations in high dosage have produced similar toxic manifestations

After ascertaining that the allergins specific to hay fever may be absorbed into the blood stream from the alimentary tract, we found that when the allergin is so prepared and conditioned it does not cause gastric irritation and may be administered orally in large doses with highly satisfactory results and without the difficulties incident to hypodermic injection

Chemistry of Allergins

Allergy producing protein fractions have been separated from ragweed pollen which is the main offender in the United States, causing loss of time from work and discomfort to many people because of the allergic rhinitis it produces.

The main allergy producing fraction from ragweed contains a pentose a flavonol pigment, and two polypeptide molecules [11] The molecular weight of the major antigen is 4 496 as determined by its empiric formula and by its sulfur and carbohydrate content It contains 11.85 per cent nitrogen and 3.33 per cent pentose, and it is a complex molecule Each molecule contains one molecule of the flavonol pigment (isorhamnetin) one molecule of pentose (arabinose) and two polypeptide molecules The two polypeptide molecules contain an aggregate of 28 amino acids and an unusually large percentage of dicarboxylic-amino acids In addition to this large molecular weight antigen four other active antigens have been separated

The second fraction is a quercetrin-dextrose-hexapeptide complex with a molecular weight of 1 168 The hexapeptide consists of monoamino acids

Fraction three is isorhamnetin-rhamnose-tripeptide complex with a molecular weight of 951

Fraction four is an isorhamnetin-rhamnose-tetrapeptide complex with molecular weight of 1 117

All these fractions are immunologically and biologically active. The process of alkaline and acid hydrolysis tends to separate these fractions from the molecule (Table 1) In a manner similar to the preparation of the cardine glucosides

TABLE 1.—EXAMPLES OF THE PROCESS OF HYDROLYSIS

Digitalis	*Hydrolysis* →	Glucose	+	Digitoxigenin
Ragweed				
1 Main allergy-producing Fraction	*Hydrolysis* →	Pentose (Arabinose)	+	Isorhamnetin and 2 Polypeptides
2. 2nd Allergy-producing Fraction	*Hydrolysis* →	Dextrose	+	Quercetrin Hexapeptide
3 3rd Allergy producing Fraction	*Hydrolysis* →	Rhamnose	+	Isorhamnetin Tetrapeptide

TABLE 2.—TYPICAL ANALYSIS

Treated pollens	
Soluble reducing sugars	0 45%
Nitrogen content	2 1%
Protein (N × 6.3)	13 2%
Untreated pollens	
Soluble reducing sugars	0 4%
Nitrogen content	2 1%
Protein (N × 6.3)	13 %

of digitalis into glucose and digitoxigenin when it undergoes hydrolysis, these compounds tend to separate (to an extent determined by the degree of hydrolysis) from their carbohydrate components (Table 2) Mild acid and mild alkaline hydrolysis must be used in order to prevent complete disruption of the allergins

Clinical Series

The purpose of the clinical series was to determine the therapeutic effectiveness of tablets of hydrolyzed mixed ragweed and common pollen and the incidence of gastrointestinal irritation and untoward reactions of an allergic nature caused by this medication

The groups used were unselected cases ranging in age from seven to fifty-nine years, an average of thirty-three and eight-tenths years (average excludes those less than twelve years) The average height was 64 5 inches (excluding those below 60 inches) The average weight of the patients was 139 5 pounds (excluding those below 100 pounds) Most of the patients came from suburban and metropolitan New York City There was one patient from Texas, one from Connecticut, and two from New Jersey Of 60 cases, there were ten children below the age of twelve years The youngest in the group was seven years old The chronic nature of allergic rhinitis is demonstrated by the average duration of the complaint, which was nine and three-tenths years

Specific Sensitivities

The specific sensitivities to the many common allergic materials were determined for each patient They included ragweed, June grass, orchard grass, roses, and dust In addition, food allergies to milk, eggs, fish, pork, chicken, common nuts, and fruits were found

The skin test was performed by making a small scratch, placing a weak alkaline solution on the spot, and adding a small drop of the dilute specific antigen The size of the wheal, the red area around it, and the development of pseudopodia were compared with a test made in the same manner with distilled water instead of the dilute antigen solution

Asthmatic Attacks

Asthmatic attacks sometimes occur seasonally with allergic rhinitis and occasionally also at other times during the year

Many patients had been given injections during previous years The course of treatment of this type usually began eight to ten weeks preseasonally and continued throughout the season Many of our patients had had oral antigen treatment in previous years In every case, our seasonal treatment consisted of giving two tablets three times a day for two weeks before the individual's season began If necessary, the number of tablets given was increased during the actual season

Results

Details of symptoms were tabulated during a period of no treatment The symptoms studied consist of running nose (rhinitis), tearing (lacrimation), skin itch (dermatosensory changes), and sneezing (paroxysmal) The number of days lost from the individual's usual activity was also noted

Running nose that was continuous throughout the day and night was noted as two plus When periods of relief of from four to twelve hours were experienced, it was noted as one plus When the symptom was not present for more than a few minutes per day, it was noted as zero

Tearing that was continuous and caused injection of conjunctival vessels was called two plus One plus represented tearing that was present occasionally Zero indicated that the symptoms were not present

When skin itch was generalized and extreme enough to cause loss of time from work or one's usual activities, it was called two plus Less than this or minor itch was called one plus When absent, it was noted as zero

Violent sneezing interfering with activity was noted as two plus When present in sufficient severity to be mentioned, sneezing was noted as one plus When present only occasionally, it was noted as zero

The same factors were noted for the seasons during which treatment with oral antigen was given and again for the seasons treated with injectable antigens Comparison of symptoms without treatment, with injectable antigens, and with oral antigen therapy is shown in Table 3

TABLE 3.—Evaluation of Symptomatic Relief

Symptom	Before Treatment	After Treatment with Oral Antigen	After Treatment with Injectable Antigen
Rhinitis	1 47	1 47*	1 30*
		0 32	0 73
Lacrimation	1 28	1 28*	1 25*
		0 28	0 50
Skin itch	1 20	1 20*	1 40*
		0 33	0 40
Sneezing	1 40	1 40*	1 43*
		0 20	0 86
Days lost from work	16 90	16 90*	14 40*
		3 80	10 87

* Top figures indicate the number with which to compare the lower average In the case of oral antigen comparison is with the Before Treatment column but with injectable antigen, comparison is with the Before Treatment' group from which cases not treated with injectable antigen have been deleted

Thus it is seen that with oral antigen therapy there was a reduction of 1.15 in the index for rhinitis, 1.00 for lacrimation, 0.87 for skin itch 1.20 for sneezing, and 13.1 days were regained from the lost from work register

With injectable antigen therapy the figures were 0.57 for rhinitis, 0.75 for lacrimation 1.00 for skin itch, 0.57 for sneezing and 3.53 days were regained from the lost-from work register

TABLE 4.—PERCENTAGE INDEX OF BENEFIT

Symptoms	Per Cent Benefited by Antigen Treatment Oral	Injectable
Rhinitis	78	44
Lacrimation	78	60
Skin itch	73	71
Sneezing	86	40
Days lost from work	78	25

Absence of Unfavorable Reactions

The average dose of mixed treated ragweed and common pollens was 85 mg Gastrointestinal irritation urticaria, itch, and increased injection of the conjunctiva (vessels) must be considered as possible ill effects of oral antigen therapy This consideration must be made in comparison with dosage given Carefully charted histories show that, even in cases where extremely large doses were given, gastrointestinal irritation, as indicated by vomiting, diarrhea or loss of appetite, due to administration of the tablets of mixed, treated ragweed and common pollens did not develop in any case of the series There was no case of urticaria, itch, or increased injection of the conjunctiva as a result of the oral antigen therapy

Summary

In a controlled series of hay fever patients treated orally with hydrolyzed antigens, therapeutic results compared favorably with those following the use of injectable antigens in the same cases These findings may be summarized as follows

1 An index of benefit of 78 per cent was found for rhinitis during oral antigen therapy and 44 per cent for injectable antigen therapy, 78 per cent for lacrimation during oral antigen therapy and 60 per cent for injectable antigen therapy, 73 per cent for skin itch with oral antigen therapy and 71 per cent with injectable antigen therapy, and 86 per cent for sneezing with oral antigen therapy and 40 per cent with injectable antigen therapy

2 Percentage decrease in days lost from work was 78 per cent with oral antigen therapy and 25 per cent with injectable antigen therapy

3 There was no instance of gastrointestinal irritation with oral antigen therapy

4 These percentages are based on a controlled series of 35 cases observed over an average period of five years Tables with detailed clinical information have been omitted to conserve space

References

1 Coca, A F Walzer M and Thommen A A, Asthma and Hay Fever in Theory and Practice Springfield Illinois, Charles C Thomas 1931
2. Touart, M D New York M J 116: 199 (1922)
3 Black J H J Lab & Clin. Med. 12: 1156 (1927)
4. *Ibid* 13: 709 (1928)
5 Urbach E. Klin. Wchnschr 10: 834 (1931)
6 *Ibid* 12: 1797 (1933)
7 Gatterdam, E. A., Jr: Southwestern Med 17: 109 (1933)
8. *Ibid.* 18 130 (1934)
9 Bernstein, C Jr., and Kirsner J B: J Allergy 8: 221 (1937)
10 Stier, R. F E and Hollister G: Northwest Med. 36: 160 (1937)
11 Rockwell G E. Meeting-in Print of the American Chemical Society Paper Section 1 B September 1948

COST OF THE COMMON COLD

An attempt to arrive at a rough approximation of the cost to the American people of their common colds has been made by the statisticians of the Metropolitan Life Insurance Company who came up with the appalling figure of well over $1,000 000-000 a year This figure was obtained by taking into account the data on incidence of the disease among wage-earners, students and other special groups, according to the studies of many reliable investigators The calculations ran somewhat as follows.

The average person suffers at least two colds a year or approximately 300 million annually for the entire country The average duration of the simple cold is five days, giving a total of one and a half billion days of discomfort decreased efficiency, or disability A conservative estimate of the time lost from work in this country is one day per employee per year or more than sixty million days lost in industry from this cause Even at a low average of $7 00 a day, the result in wages alone is more than $420 000 000 annually

The amount spent on medical care and drugs for the treatment of colds by the average family is impossible to arrive at, but it was assumed to be about $10 00 a year or a total of about $400 000 000 No attempt was made to estimate the cost to employers resulting from the loss of production and disrupted routine, but it, too must reach a considerable figure for the country as a whole

These calculations led the Metropolitan s statisticians to arrive at the estimate of over $1,000 000-000 a year as the cost of the common cold to the American people Although the common cold is generally considered to be a minor illness, they concluded that any disease in which the cost runs to such astronomic figures must be rated high in the list of enemies of the public health —*New England Journal of Medicine October 7 1948*

THE FALLACY OF HYDROCHLORIC ACID INTERPRETATIONS IN GASTRIC SURGERY

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THE advent of vagal neurectomy has strongly emphasized the role of acid secretion in the etiology of peptic ulcer [1] The beneficial effects following vagotomy are in part ascribed to diminished hydrochloric acid secretion [2-4]

Although gastrojejunostomy was originally conceived as a relief from pyloric stenosis, it was performed for many years for peptic ulcer There were several elements in the rationale for this operation (1) it overcame obstruction at the pylorus, (2) by diverting acid gastric contents into the jejunum, it allowed healing of duodenal ulcers, and (3) it diminished gastric acidity by regurgitation of alkaline jejunal contents through the stoma Today, gastrojejunostomy is only employed in pyloric stenosis due to peptic ulcer, and even then, a concomitant vagotomy is usually performed

In the 1920's, when gastrojejunostomy proved to be unsuccessful and a high percentage of cases were followed by gastrojejunal ulceration, gastrectomy became popular At first, partial gastrectomy was done on the theory that the removal of the pylorus, antrum, and lower part of the stomach would eliminate the hypothetic secretagogue, "gastrin," which was supposed to be formed in the mucosa of the pyloric portion of the stomach by the action of hydrochloric acid on the mucosa [5] Gastrin was believed to be absorbed into the circulation and carried to the fundus and body of the stomach where it stimulated renewed secretion of hydrochloric acid

Gastric surgeons criticized their colleagues or associates for their poor results and blamed the poor results on the inadequate resection of the stomach Thereupon, each surgeon attempted to remove more and more of the stomach, so that ultimately, the operation was considered correctly performed only if it fell into the category of being a "subtotal gastrectomy"

Heuer and his colleagues found that a reduction in acid secretion occurred after resection, depending on the extent of the resection [6] They concluded, however, that resection of any magnitude consistent with a reasonable mortality does not insure achlorhydria Moreover, the clinical result of resection could not be correlated with a change in acidity, since, of 90 per cent of the patients who had satisfactory results from the operation, only 25 per cent had a reduction in acidity They were of the opinion that, if their observations were confirmed by others, the idea of insuring achlorhydria by larger and larger resections would appear to be of doubtful value

Even today, in the largest gastrointestinal clinics throughout the country, subtotal gastrectomy is done in the hope of abating the acid-producing mechanism When partial gastrectomy fails, recurrences of gastrojejunal ulcers are treated by repeated higher and higher resections, and ultimately total gastrectomy is attempted

Nevertheless, it is very doubtful whether there is any specific "gastrin" mechanism [8] Experimental laboratory support for this theory seems to fall down under more careful scrutiny It is now believed that the effects observed were due to histamine, which was probably the substance obtained when extracts were made of the pylorus for intravenous injection [8] Therefore, at present, although there is no adequate theoretic rationale for pyloric resection for the purpose of reducing gastric acidity, it is well established from clinical observation that the operation often produces this effect

> It can safely be said that a reduction of acidity may be expected to follow in most cases of resection for gastric ulcer In the case of duodenal ulcer, however, the effect on acid secretion is problematic, to say the least [7]

How can we reconcile this paradox? I believe the fault lies in the conception of gastric surgeons and gastroenterologists in the appraisal of gastric acidity Irrespective of the type of operation performed for peptic ulcer, the chief criterion for evaluating the results of operation, aside from clinical improvement, has been the creation of diminished gastric acidity Whether gastrojejunostomy, pyloroplasty, pylorectomy, partial or subtotal gastrectomy or vagotomy, or any combination was performed, the good results were attributed to the diminution or complete cessation of acid production When the clinical results were good and relatively low acid figures were found, the operation was hailed as physiologically correct On the other hand, the failures, even in the presence of anacidity, were not so easily explained

> Kiefer showed from a study of 141 patients that 68 per cent showed no free acid in a single forty-five minute specimen after an Ewald test meal following resection However, when hista-

mine was used, 16 out of 123 patients with a negative response to the Ewald meal were found to have free acid. He concluded that the secretion of free acid persists after subtotal gastrectomy in an appreciable number of cases provided the stimulation is adequate. Jordan and Kiefer have emphasized the importance of securing fractional specimens for at least two hours with the patients lying flat in the supine position with the tip of the tube in the resected stomach if accurate values of acidity are to be obtained.[7]

The fallacy of seeking anacidity lay not in the choice of surgical procedure but in the interpretation of the hydrochloric acid determinations. No matter whether fasting gastric contents, gruel tests, night tests, insulin histamine or any other method was employed the aspirated gastric contents have been almost exclusively examined only for free hydrochloric and combined acid. The failure to examine the aspirated material for total chlorides has led to a serious misconception of the end results in gastric surgery.

Earlier efforts to evaluate intragastric neutralization based on the ratio of neutral to total chlorides (the chloride index) have been far less successful than the neutralization test and very little use has been made of this procedure.[8] Of late, investigators have come to the conclusion that reduction of gastric acidity is due to dilution by the admixed substances as well as to neutralization.[10 11]

The main constituent of gastric secretion is hydrochloric acid, which is primarily formed in the fundus and body. However, it is also formed in the pyloric region. The exact means by which it is elaborated is unknown. Its main function is to activate pepsin. Whether rennin exists as a separate ferment is disputed, since it is believed to be identical with pepsin.

The total chlorides of the gastric juice consist of three components: free hydrochloric acid, combined hydrochloric acid, and inorganic chlorides. Inorganic chlorides are either secreted in this form by the gastric mucosa, or they result from the combination of gastric, free hydrochloric acid with regurgitated duodenal or jejunal content (in the case of gastrojejunostomy). There is an inverse relationship between the concentration of acid and base in gastric juice.[12 13] The relative proportion of chlorides among the three forms varies according to the amount of protein ingested, the amount of regurgitation through the pylorus or gastrojejunostomy, and other factors.[14]

The concentration of hydrochloric acid in the stomach content at any given time will depend upon many varying factors. Among these may be mentioned the total blood electrolyte concentration, the state of dehydration or hydration, the activity of the blood supply to the stomach, the amount of water absorbed from the stomach, the rate of stomach emptying, the amount of diluting juices from the mouth and small intestine, the activity of the vagus and splanchnics and of humoral gastric secretagogues.[15]

Therefore, under any circumstances the total chlorides are the truest indications of the total hydrochloric acid secreted.[14 16]

Aspirated gastric contents consist of gastric secretions in addition to saliva and regurgitated duodenal or jejunal secretions containing pancreatic juice and bile. Normally, fasting total acidity is between 0.45 and 0.60 per cent and free hydrochloric acid is 0.4 to 0.5 per cent. One to two hours following test meal, free hydrochloric acid falls to 0.1 per cent. This fall is accompanied by a proportional rise in the inorganic chlorides. This is explained by the regurgitation of alkaline duodenal contents in the latter stages of gastric digestion.[16 17] If the pylorus fails to remain patent between gastric peristaltic waves, the curve of gastric acidity climbs steeply. If the pylorus opens too early, the amount of free hydrochloric acid in the aspirated contents is low or absent. However the amount of inorganic chlorides increases inversely. This situation is usually found in atonic stomachs.

It is now evident that gastric acidity depends not only upon the amount of acid secreted, but also upon the action of the pylorus or the gastrojejunal stoma together with the motility of the stomach. The latter factors influence the extent of regurgitation of alkaline juices.[16–18]

This conception of estimating the *total* chlorides rather than free and total hydrochloric acid alone is not new.[8 16] However, the writer feels that in their ardent zeal to achieve anacidity surgically surgeons and their associated gastroenterologists have forgotten this basic physiologic truth. When one listens to extended presentations and discussions at gastrointestinal conferences where acid figures are tabulated at great length but no mention is made of *total* chlorides in gastric contents the obvious conclusion is that the results of gastric surgery are being seriously misjudged.

Conclusions

1. All forms of surgery for peptic ulcer alter gastric motility.
2. Regurgitation of duodenal or jejunal juices are partly responsible for low acid figures by neutralization.
3. Only estimation of total inorganic chlorides will give a true indication of the acid gastric secretion.
4. The present method of reporting acid figures following gastric surgery is misleading.
5. Newer methods for determining the effects

of gastric acid secretion and motility are needed, rather than newer technics of gastric surgery

References

1 Dragstedt L R Palmer W L Schafer P W, and Hodges P C Gastroenterology 3 450 (1944)
2 Dragstedt L R and Schafer P W Surgery 17 742 (1945)
3 Moore F D J A M A 133 748 (1947)
4 Ruffin J M Grimson K S and Smith R C Gastroenterology 7 599 (1946)
5 Ivy A C Lim, R K S and McCarthy J E Quart J Exper Physiol 15 55 (1925)
6 Heuer A J Holman C, and Cooper, W A The Treatment of Peptic Ulcer Based Upon Ten Years Experience at the New York Hospital Philadelphia J B Lippincott Co 1944.
7 Boles R S J A M A 136 528 (Feb 21) 1948
8 Babkin B P Canad M A J 18 267 (Mar 1928
9 Holler, M Bloch M and Lewin N Ztschr f d ges exper Med 79 134 (1931)
10 Hollander, F and Penner A Am. J Digest Du 5 786 739 (1939)
11 *Ibid* 6 22 (1939)
12 Bliss, T L Ann Int Med 3 838 (Feb) 1930
13 Hollander F Proc Am Gastro-enterol Asso 11 35 (1936)
14 Wilhelmj C M, Henrich L C Neigus I, an Hill T C Am J Physiol 108 197 (1934)
15 Bockus H L Gastro-enterology Philadelphi W B Saunders Co 1946, vol 1 p 186
16 Bolton C and Goodhart G W Lancet 1 42 (1922)
17 Boldyreff, W Quart J Exper Physiol. 8 1 (191
18 Spencer, W H, Meyer, G P Rhefuss, M D, an Hawk P B Am. J Physiol 39 459 (Feb) 1946
19 Apperly F L Am. J Digest Dis 4 9 (1937)

RADIOGRAPHIC PNEUMOPERITONEUM IN ACUTE PERFORATIONS OF THE GASTROINTESTINAL TRACT

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THERE have been numerous conflicting reports concerning the incidence of pneumoperitoneum in perforations of the gastrointestinal tract since 1915 when Popper first suggested the use of roentgenography as an aid in its diagnosis [1] Various authors have reported figures ranging from 43 5 per cent to 100 per cent since then [2–5] However, almost all of these statistics are based on experiences with perforations of the stomach and duodenum

I have surveyed all of the cases of perforation of the gastrointestinal tract from 1933 to 1945, which were admitted to the ward services of the Mount Sinai Hospital, in an effort to obtain the following information (1) incidence of perforation of the different divisions of the gastrointestinal tract, (2) incidence of the x-ray finding of pneumoperitoneum in proved cases of perforations of the different divisions of the gastrointestinal tract, and (3) whether the factors of time or size of the perforation influence the finding of pneumoperitoneum radiologically In the thirteen-year period covered by this report, there were 322 cases of acute perforations of the gastrointestinal tract proved by operation or autopsy Of this number only 87, or 27 per cent, had x-ray studies (Table 1)

The incidence of perforation of the various portions of the gastrointestinal canal in the order of frequency was as follows appendix, stomach duodenum, large bowel, and jejunum and ileum This finding is essentially in accord with that of Abbott [6]

Of the 322 cases included in this report, 141, o

TABLE 1 —322 ACUTE PERFORATIONS OF GASTROINTESTINAL TRACT

Anatomic Site	Number of Cases with Perforations	Per Cent of Total	Number of Total X rayed	Per Cent of Total X-rayed	Number of Positive X-rays	Per Cent of Positiv X-rays
Stomach	66	20 5	27	40 9	16	59 3
Duodenum	62	19 3	27	43 5	19	70 4
Jejunum and ileum	26	8 1	8	30 8	3	37 5
Appendix	141	43 8	14	9 9	1	7 1
Large bowel	27	8 3	11	40 7	7	63 6
Total	322	100 0	87	27 0	46	52 9

43.8 per cent, were perforations of the appendix. Of these 141 cases, 14, or 9.9 per cent had x ray studies for pneumoperitoneum. A positive finding was present in only one case, that of a fifty-four year-old man with a five-day history. In an analysis of this group that had had x ray studies, it should be noted that only two patients were under thirty years of age. Apparently the perforation of a viscus other than the appendix was suspected.

Other authors have also reported cases of pneumoperitoneum in perforated appendix.[4,7,8] It is not widely recognized that this can occur, and no large studies of the incidence of this finding have been recorded in the literature. From this small series one must conclude that it is unusual. The probable reasons for the infrequency of intraperitoneal air in perforated appendix are, first, the smallness of the lumen which becomes occluded by the inflammatory exudate and second, the fact that the appendix not uncommonly lies retrocecally.

Of the 66 cases involving the stomach only 27 were examined by x ray, and of these 27 16 were of pneumoperitoneum. However, all cases with duodenal involvement with a duration of symptoms of more than twelve hours before x ray studies were undertaken showed the characteristic findings of intraperitoneal air. This conforms with the conclusions of Levine and Sohs-Cohen namely, that the greater the time interval the greater the likelihood of positive findings and the greater the accumulation of air.[12] Johnson however opposes this view, claiming that the chances of obtaining roentgen evidence of pneumoperitoneum are best soon after the acute episode.[9]

There were 27 cases of large intestinal perforations of which 11 were studied by roentgenologic methods. Of these seven had evidence of air intraperitoneally, a frequency of 63.6 per cent. It is interesting to note that of the seven positive cases five were due to trauma and two were secondary to ulcerative colitis, whereas of the four negative cases two occurred in malignant neoplasm and two in diverticulitis. In view of the small size of this series one cannot draw any inferences as to the relationship of time, size, and

TABLE 2.—COMPARISON OF POSITIVE AND NEGATIVE X RAYS

Anatomic Site	Number of X-rays		Average Number of Hours of Acute Episode Prior to X ray Study		Extremes of Time Hours		Average Size of Perforation Recorded at Operation or Autopsy (Cm.)		Extremes of Size (Cm.)	
	Positive	Negative	Positive	Negative	Positive	Negative	Positive	Negative	Positive	Negative
Stomach	16	11	0	19.8	2-72	9-180	0.8	1.0	0.3-1.5	0.3-3
Duodenum	19	8	31	5.5	1-192	1-12	0.5	0.6	0.2-1.0	0.1-2.0
Jejunum and ileum	3	5	10.6	19	1-30	1-48 6-168	1.2	1.4	0.5-2.0	0.2-3.0
Appendix	1	13	108	64		1-72				
Large bowel	7	4	2.5	2..	0.5-6					
Total	46	41								

positive a frequency of 59.3 per cent. This figure is lower than that usually reported.[2,4,6,7,9] Analysis of these cases with positive and negative roentgen findings revealed no significant data as to either the duration of perforation before x ray study was done or the location or the size of the lesion (Table 2). In this series the cause of all gastric perforations was benign gastric ulcer. It was also noted that in none of the cases studied roentgenographically did the perforations occur on the posterior wall of the stomach.

With reference to the duodenum all perforations but one were secondary to benign ulcer. There were 62 cases of perforation, of which 27 were x rayed. Of these 27 19 were positive, a frequency of 70.4 per cent which is perhaps a little lower than that usually reported.[4,9] Analysis of this group did not allow one to draw any inferences with respect to the size and the location of the perforation in affecting the frequency of location of perforation to pneumoperitoneum with any degree of accuracy.

There were 26 cases of perforations of the jejunum and ileum in this report of which eight had x ray studies. Of this number three were positive, an incidence of 37.5 per cent. Again one has too few cases to draw any significant conclusions.

Discussion

All the cases included in this report were of acute onset or had an acute episode during their illness with the physical findings of the so-called 'acute abdomen.' Klingenstein and Tuchman reported some of the cases in this series that occurred during hospitalization.[11]

Any means of making a diagnosis of perforation of the gastrointestinal tract would be a great aid and would tend to lower the incidence of operations now performed for acute abdominal conditions. It has been shown experimentally on

lem—why some men become excessive drinkers and why excessive drinkers become addicts"*

This research can best be carried out through the establishment of clinic hospital units Such a unit will be soon set up as a demonstration under the auspices of the New York State Department of Health, the New York State Department of Mental Hygiene, and the Medical Society of the State of New York

The School of Medicine of the University of Buffalo has assumed the responsibility for the administration of such a demonstration unit, and, with the active cooperation of the hospitals connected with the medical school and the local Alcoholics Anonymous along with the Council of Social Agencies and its component agencies, rehabilitation and research material of value should be obtained

We must ever keep the following concepts in mind if we are to succeed

1 Alcoholism, or problem drinking, is a disease, and the problem drinker is a sick person

2 The problem drinker can be helped and is worthy of help

3 This is a public health problem and, therefore, a public responsibility

* Haggard H. W and Jellinek E M Alcohol Explored Garden City Doubleday 1942

SCIENTIFIC EXHIBITS
1949
ANNUAL MEETING

Applications for space for the scientific exhibits should be made directly to the Chairman of the Subcommittee on Scientific Exhibits of the Convention Committee

Dr J G Fred Hiss
505 State Tower Building
Syracuse 2, New York

The Annual Meeting will be held May 2 to 6, 1949, at the Hotel Statler in Buffalo

No applications can be considered after January 1, 1949

There will be two groups of awards

Awards in Group I are made for exhibits of individual investigation, which are judged on the basis of originality and excellence of presentation

Awards in Group II are made for exhibits which do not exemplify purely experimental studies and which are judged on the basis of excellence of presentation and correlation of facts

W P Anderton, M D , *Secretary*

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Index to Volume 48—Part II

July 1—December 15, 1948

Pages	Number	Date
1423–1534	13	July 1
1535–1646	14	July 15
1647–1758	15	August 1
1759–1870	16	August 15
1871–1982	17	September 1
1983–2094	18	September 15
2095–2206	19	October 1
2207–2318	20	October 15
2319–2430	21	November 1
2431–2542	22	November 15
2543–2654	23	December 1
2655–2764	24	December 15

Authors

Abraham, Albert 1503
Abramowitz E., William, 1937
Abrams, Robert E., 1490
Acster J. Lewis, 24 3
Acosta, V Charles 2029
Andrews, G C., 2049
Ast Morris, 1613
Aptaker A. J., 1603

Barker Leslie Paxton, 1909
Bass, Murray H., 1907
Bellevue Hospital 1735
Benjamin, Zachary H., 2282
Berwick William F., 2364
Bikoff William, 608
Binkley George L., 2145
Bisbop, Howard F., 1685
Bissell, Merlin A., 2025
Bloom, Samuel, 2290
Bookman, John, 2706
Backus, H. L., 2252
Boyd, David F., 1487
Boyd, Linn J 1500
Brodey Adrian, 1931
Brodie Bernard B., 1711
Browder, E. Jefferson 1367
Brown, Earl B., 1465
Brown, Frederick W 1463
Brunschwig, Alexander 1733
Brust, John C M., 2138
Burford, George Edgar 1715

Cahn, Herbert L. 2622
Cameron, Paul J., 1611
Campbell Meredith F., 2307
Canizares Orlando 2094
Cantor Alfred J., 1492
Carter R. Franklin, 2243
Chait, Robert A. 2019
Cipollaro Anthony C., 1931
Clark, Stanley B 1547
Clew, Hollis E. 2337
Cosgben, Frank C., 2024 2599
Conway Herbert, 2040
Cormia Frank E. 2037
Cornell University Medical College 2050
Corney, George M , 1001
Corradini, Everett W., 2307
Cosgriff Stuart W., 1483
Costello Maurice J 2481
Cross, Richard J., 1483
Currence, John D 2044
Cutler Coodiet W., Jr., 1824

Dallas, Harold F., 1949
Davison, Selvan, 1836
De Angelis Carmelo L., 1718
De Voe, Shirley J., 1601
Domoakos, A N., 2029

Eastman, H. D 1703
Elsten, B., 1703

Felbush Joseph S., 1932
Feinblatt Henry M., 2720

Feinblatt T M 2780
Feldman William H , 2 60
Ferguson Edgar A Jr 2720
Ferarra, Bernard J 2400
Finestone Edward O 27 4
Fisohl, Arthur A , 2401
Fishman, Alfred P 2303
Freirich Karl 401
Friedfeld Louis 2047

Gelfand H Harold, 1947
Glaser I adore 2700
Glea on, Marion Norris 2168
Glotzer Sol 1461
Goldbloom A Allen 1467
Goldstein, Norman 608
Goodfriend Milton J., 1583
Graham, Thoma N 1916
Gran y Charles M., 2043
Graubard David J 1003 608
Greenberg David 1952
Greenfield Irving 1501
Griffin Joseph R. 1718
Gubner Richard 2491

Habif David V , 1483
Hallinger Earl S , Jr 1909
Hayes J V., 1477
Hopper, M E. 2029
Huber William, 1909
Hyams Mortimer N., 2581
Hyman, Abraham, 2393

Javert Carl T 2505
Jemerin, Edward E., 2776
Judovich Bernard D., 2382

Kaufman, Carl, 2024
Keating John H., Jr., 1507
Kelly John F 1474
Kirk, Thomas Rogers 2165
Kleinschmidt H E. 1831
Kroop Irving G 2393
Krueger Frederick J 1470
Kurtin, Abner 1606

Lapan Bernard 2612
Leibowitz Harry 2390
Leibowitz Sidney 1838
Leinwand Irving, 1503
Leiter H. Evans 2393
Leiter Louis 1803
Lenahan, Rose M., 1099
Lerner Charles, 1037
Levin Louis 1474
Levy Walter C., 2171
Lewis George M., 2037
Liber B 1742 2306
Lieberson Abral m, 1467
Lief Philip A 1711
Lipkin Mack 1015
Lisa James R., 1029
Little Sherman 2379
Loeb Martin J 1841
Loftus Edward R. 1685
Lohman Herman 2173

Lo Robert A 1013
Lub we Irwin I 1505
Luehrs Leslie F 1827
Lyon Sidney S., 1943

Mackenzie Locke L., 407
Major Stephen 1489
Mareus Harold 1461
Marcus Herbert R 204
Ma low Harry 2390
Masterson John J 2405
McGavack, Thomas H 1590 1797 1800 2015
Merritt H Houston 23 1
Mey r Frank C 2093
Michel Arthur A 1470
Moon Adams D ney 1819
Morris Milton H 1469
Myers Harvey L 2619

Nach Robert L. 2173
Nathan Abraham, 1611
Nesbit Maude F 1610

Pacella Bernard L., 2387
Papper, E M 1711
Park W lham M Jr 1685
Parry H. Fraser 1477
Parsons, W lliam Barclay 2149
Perera George A., 1704
Peskin, Henry 1509
Peterson, Milton C., 1093
Pfaus, F A., 2272
Pieri, Raymond J., 2093
Pollack, Herbert, 2706
Post, Charles F., 1920
Potter Milton 2739

Raffensperger Edward C 2282
Rainey John J 1833
Rawls, William B 2629
Reid, Duncan E. 2601
Reuling James R 1093
Riter Seymour 1617
Romaine Hunter H., 1916
Rose Harry M., 2268
Roston, Edward H , 2501
Rovenstine E A 1711
Rulison, Ray H. 1916
Rusk, Howard A 1579
Russak, Henry I., 1483, 2278

Sacca Joseph D., 1619
Sachs Wilbert, 1931
Safian Leroy S., 2100
Saperstein, Rose B. 2599
Sarner, Joseph B., 2138
Sarnoff Jacob 1490
Sayrol George M 1618
Seal, J Coleman, 2715
Schreier Herbert, 2587
Schwab W., 1703
Schwartz, Emanuel 14 4
Schweig, Ka l 1822
Schwimmer David, 1797 1800
Searles Paul W 1099

Sevringhaus Elmer L. 2587
Shanahan Robert H , 1718
Shatin Harry 2024
Sheard Charles Jr 1920
Shookhoff, Howard B 2133
Siegel Bernard B 2019
Silverman, E G 2280
Smith, Emil 2608
Snell Albert C Jr 2710
Snell, H. Arthur 2590
Solomon Harry A 1593
Southworth James L 2278
Spain, W C 2272
Steiner Alfred 1814
Stenbuck, Joseph B 2403
Stevenson Ian P 2156
Stollerman Gene H 2501
Stover Oscar H 1689
Stringer Sydney W 1621
Swersie Allan K., 1607

Taylor Helen M 1622
Terry Richard N 1709
Timoney Francis X 1506
Toharsky Beatrice 2501
Turney M Frank 2367
Turtz Charles A 2489
Twiss, J Russell 2245

Ungerleider, Harry E , 2491

Vandow Jules E 2481
Vorzimer Jefferson J 2047

Waldman Milton H. 1693
Walzer Eugene H. 2019
Walzer, Matthew 2019
Watkins Arthur L 1729
Watts Joseph Cook 1603 2627
Weissberg Jonas 1596 2615
Wertz Carlton E 1585
Wilensky, A. O 2605
Winkelstein Asher 2153
Winter Richard E 1940

Yontef, Reuben 1606

Zelson Carl 1611
Zingaro Angelo A 2718
Zohman Burton L , 2278

Subject and Departmental Index

Articles

Abdominal hernia 2404
Abortion habitual, 2595
Abortion idiopathic diethylstilbestrol in 2612
Accident Prevention in Medical Practice (Kleinschmidt) 1831
Accident prone Patient (Gleason) 2168
Acne vulgaris photosensitization therapy of 1606
Acute Pancreatitis (Bockus and Raffensperger) 2252
Agranulocytosis Fatal Following Ingestion of Aminopyrine (Leibowitz) 1838
Alcoholism—A Challenge to the Medical Profession (Potter) 2729
Allergy
  hydrillin in, 2390
  antihistaminic combination in treatment of 1465
  antihistaminic substances evaluation of 2272
  see also Thephorin Ragweed Pollination Hay Fever Hydrillin
Aminophyllin Determination of Circulation Time (Friedfeld Marcus and Vorzimer) 2047
Aminopyrine agranulocytosis following ingestion 1838
Analgesia and Anesthesia Spinal in Obstetrics (Snell) 2590
Anal sphincter preservation 2605
Anesthesia
  intercostal muscular paralysis as a phenomenon of 1715
  intravenous 1699
  procaine in the injured hand 1693
  pulmonary tuberculous spreads following 1685
  sphenopalatine ganglion block 2475
  spinal in obstetrics 2590
  spinal, pitressin for prolongation of 1689
  in thoracic surgery 1943
  topical 2599
Anterior Poliomyelitis Acute New Method in the Management of (Smith Graubard Goldstein and Bikoff) 2608
Antihistaminic Drugs
  Antihistaminic Combination in the Treatment of Allergic Disorders Use of a New (Brown and Brown) 1465
  Antihistaminic Substances Evaluation of the Present Status of (Spain and Pflum) 2272
  see also Allergy
Antistine Neo-Antergan and in the treatment of ragweed hay fever 1474
Anuria Management of in Acute Mercurial Intoxication (Fishman Kroop Leiter and Hyman) 2393
Arteriosclerosis *see* Hypertension
Asthma *see* Allergy

Bacterial and Virus Pneumonias (Bellevue) 1735
Block sphenopalatine ganglion 2475
Blood Pressure?, What Is Normal (Russek) 1485
Boeck's Sarcoid Fatal Hemmorrhage in (Fischl and Freireich) 2401

Cancer *see* Carcinoma
Carcinoma
  of the cervix 1733
  of the cervix detected by vaginal smear 2407
  of pancreas 2149
  of pancreas simulating spinal cord tumor 2629
  of rectum and rectosigmoid 2605
  see also Polyp Leiomyofibroma
Carotid Sinus Syndrome (Morris) 1499
Cerebral Vascular Accidents Practical Aspects of (Merritt) 2371
Cervix Advanced Carcinoma of the Surgical Treatment of (Brunschwig) 1733
Cervix Early Carcinoma of Detected by Vaginal Smear (Mackenzie) 2407
Child Guidance Clinic Function of in a Children's Hospital (Little) 2379
Cholesterol Significance of, in Coronary Arteriosclerosis (Steiner) 1814
Cinchophen hepatitis due to 2282
Circulation time aminophyllin determination of 2047
Clinicopathologic conferences 1735
Colon polyps 2145
Conferences on Therapy 2050
Congestive heart failure renal dysfunction in 1803
Constitutional Approach to Medicine (Stevenson), 2156
Contributions of Physical Medicine in Poliomyelitis Some (Watkins) 1729
Convalescence nutritional requirements in 2706
Coronary arteriosclerosis cholesterol in 1814
Coronary Occlusion Prodromal Symptom of (Winter) 1940
Corrective rhinoplasty potentialities and limitations of 2160
Curare *see* Anesthesia
Cutaneous Anthrax Treatment of with Penicillin (Griffin Shanahan and DeAngelis) 1718

Deafness Prevention of by Elimination of Hypertrophied Lymphoid Tissue in the Nasopharynx by Radium Therapy (Seal) 2715
Dermatitis Contact from Beetles with a Report of a Case Due to the Carpet Beetle (Anthrenus Scrophulariae) (Cormia and Lewis) 2037
Diabetic Acidosis Severe with Extreme Low Carbon Dioxide Combining Power (Watts Aptaker and Reuling) 1603
Diabetes Complicated by Tuberculosis Management of (Ant and Love) 1613
Diabetes estrogens in 1461
Diabetic syndrome misuse of insulin in 2587
Diethylaminoethanol *see* Procaine Anesthesia
Diethylstilbestrol in the Treatment of Idiopathic Repeated Abortion (Lapan) 2612
Diphtheria Infection of the Skin of the Feet (Levy) 2171
Diverticulitis of the Rectosigmoid with Acute Obstruction Caused by Associated Intussusception (Saypol and Lipkin) 1615
Diverticulum pharyngo-esophageal 1709
Dystrophia Myotonica Complicated by Thrombo-Angiitis Obliterans and Pseudohypertrophic Muscular Dystrophy (Leinwand) 1503

Electrocardiogram in Catatonic Schizophrenia (Major), 1489
Electrocardiogram Unipolar Devices for the Rapid Recording of (Lieberson and Goldbloom) 1467
Electrocardiography Clinical Newer Aspects of (Gubner and Ungerleider) 2491
Electronarcosis in Psychiatric Therapy (Pacella) 2387
Elusive Mental Cases (Liber) 1722 2506
Endocrine state inulin clearance in the altered 2615
Epithelioma pigmented basal cell 1931
Erythema Multiforme (Costello and Vandow) 2481
Erythema Multiforme Bullosa (Steven Johnson Type) (Nathan Cameron and Zelson) 1611
Esophageal Intubation for Repair of Pharyngo-Esophageal Diverticulum (Torry) 1709
Esophagus Congenital Malformation of without Tracheo-Esophageal Fistula (Lisa and Taylor) 1622
Estrogens in Diabetes (Marcus and Glotzer) 1461
Eye and Skin Manifestations of Systemic Disease, Some Associated (Givner) 2700

Fallopian tube leiomyofibroma of 1621
Female Perineum Its Structure Function and Preservation (Pieri and Meyer) 2693
Femoral vein ligation, gangrene following, 1480

inal Defects Resulting from Illnesses of the Pregnant Mother with Special Reference to Virus Disease (Bass) 197
ceous bolyl Intestinal obstruction due to 2106
Friedländer Bacillus Pneumonia Treated with Streptomycin (Ensting) 1567
ank, solar barrie of 2489

Gallbladder Congenital Absence of with Obstructi Jaundice Due to a Solitary Gall tone (Timoney) 1500
Gangrene of Both Legs Following Femoral Vein Ligatio (Gemmell) 1450
Gangrene of the Hand Following Traumatic Occlusion of the Radial and Ulnar Arteries (Nash and Lohman) 1 3
Gastrointestinal Tract
perforations of 2720
Genital diseases 133
Genetics see Patients

Habitual Abortion (Javert) 2595
Hand
gangrene of 1723
Hazard, procaine in management of 1603
Haymes, Early Care of Some Common Difficulties (C ker) 1824
Hay Fever
hydrolyzed oral, antigens 2709
Heo-Asterpan and Antistine in, 14 4
see also Allergy
Headache postlumbar puncture 149
Heart disease organic coexistence of Wolff Parkinson White syndrome and, 161
Heerfordt's in Boeck s sarcoid 2401
Hepatitis Due to Cinchophen, with Recovery (Benjamin) 2581
Hernia, Direct Abdominal (Stentuck) 2401
Hernia, Strangulated Reduced En Masse (Graney and Bissell) 2625
Herpetic a Disease Involving the Nose (Cahn) 622
Hormones see Estrogens
Horses
antihistaminic combination, 1465
(Diphenhydramine and Aminophyllin) Evaluation of in the Symptomatic Treatment of Allergy (Markow Bloom, and Leiboent) 2390
exhaustion of 2390
see also Allergy
Hydrocephalus, schizencephalies with 2304
Hydrochloric Acid Interpretations, Fallacy of in Gastri Surgery (Thestone) 2721
Hydrolyzed Oral Hay Fever Antigens (Feinblatt and Ferguson) 2720
Hypertension
manifestation of hypertensive disease 1724
selection of patients for sympathectomy 2078
Surgical Treatment of (Boyd) 148
see also Blood Pressure
Hypertensive Vascular Disease Hypertension A Manifestation of (Perera), 1724
Hypothermia Extreme (Loeb), 1841
Hypovolemia Fatal (Watts) 2027
Hysterectomy prolapse following, 581

Idiopathic repeated abortion, 2561
Ileal perforation, intestinal obstruction with, 106
Ileitis fast resuscitation, pulmonary pathology related to 1703
Infection, spinal epidural (Loeb), 2307
Insulin, Misuse of in Diabetic Syndrome (Schreier and Herrington) 587
Interscalal Muscular Paralysis as a Phenomenon of Anesthesia (Hollister story of (Burford) 1715
Intestinal Obstruction with Ileal Perforation Secondary to Ingested Foreign Body (Flearra) 2406
Intradermal injection of insoluble pigments for camouflage of port-wine stain of the face 2040
Intrathecal Use of Pitressin for the Prolongation of Spinal Anesthesia (Stover) 1089
Intravenous Anesthesia (Beasley and Lenahan) 1699
Intravenous Procaine in the Management of the Injured Hand (Graybard Waldman and Peterson) 1903
Intubation, esophageal, in pharyngo-esophageal diverticulum, 2709
Iodin Clearance in the Altered Endocrine State (Weisberg and McGavack) 2015
Iodoxyllin, Postoperative (Snell) 2710

Jaundice obstructive, 1506

Keratitis, syphilitic interstitial 1916

Labor Prolonged Management of the Problems Associated with (Reid) 2601
Laparotomy incision liver biopsy through, 2276
Laxative, methylcellulose as 1824
Leiomyoroboma of the Fallopian Tube (Stringer), 16-1
Leukemia, Myelogenous, Resulting from Benzol Poisoning (Rasca) 1619
Library Services Medical New York State to Physicians (Nesbit) 1610
Liver Biopsy Guided Through Laparotomy Incision (Jemerin) 2776
Local Heat Practical Application of (Currence) 2044
Loeffler's Syndrome (Dallas) 1949
Low income subscribers, service contract for 1583
Lumbosacral pain sphenopalatine ganglion block for relief of 450

Malformation of the esophagus, 1622
Medical care plans of New York State voluntary nonprofit, 1 83
Ménière's Syndrome Medical Treatment of (Rainey) 1833
Meningitis, tuberculous 2280
Mental patients after rabies 2367
Mercurial Diuretics Oral Success with (Solomon and Abrahams) 1583
Mercurial injection management of anuria in, 2393
Metabolism protein 1707
Methylcellulose Use of as a Bulk Laxative (Schweig) 1822
Milk borne outbreaks of 1909
Multiple venous thromboses in carcinoma of pancreas simulating spinal cord tumor 2709
Musculoskeletal painful disorders of 2505
Muscular dystrophy, pseudohypertrophic 1503
Muscle paralysis intercostal 1716
Muscular pain relief of 2475
Myelogenous leukemia 1619

Neo-Antergan and Antistine in the Treatment of Ragweed Hay Fever A Clinical Evaluation of (Lovin Kelly and Schwartz) 14 4
New York State Medical Library, 1610
Nonprofit Medical Care Plans of New York State Voluntary Benefit Offered by (Wertz) 1585
Nutritional Requirements in Convalescence (Pollack and Bookman) 2706

Obstetrics, spinal analgesia and anesthesia in, 2590
Occlusion of radial and ulnar arteries, gangrene of the hand following 2173

Paralysis Disorders of Skeletal Muscle, Treatment of (Cornell) 2050
Parkinsonism Rheumatism (Davison) 1836
Pancreas
Carcinoma of the Head of, Simulating Spinal Cord Tumor with Multiple Venous Thromboses (Rawls and Ancona) 2709
Head of the, Radical Operations on (Parsons) 2149
Pancreatitis, acute 52
Patients Admitted to a Mental Hospital After the Age of Sixty, Outlook for (Clow) 23 7
Penicillin
in cutaneous antitrax 1718
Delayed Reaction to Treated with Thephorin (Lubowe) 1503
procaine, in hospital practice, 2601
Pentothal sodium see Anesthesia
Peptic ulcer vagus nerves in therapy of 2153
Perineum female 2693
Perforations of the gastrointestinal tract, 2776
Pharmacologic properties of procaine and diethylaminoethanol, 1711
Pharyngo-esophageal diverticulum 1709
Phenylethylhydantoin in the Treatment of Sydenham Chorea (Kirk) 2153
Photoensensitization Therapy of Acne Vulgaris (Kurtin and Yonteff) 1606
Physical Medicine
local heat, 2044
in poliomyelitis 1709
see also Therapeutics
Physician and the Venereal Disease Patient (Lushr) 1827
Physiotherapy see Physical Medicine
Pigmented Basal Cell Epithelioma (Capollaro Sachs, and Brodley), 1631
Pigments, insoluble intradermal injection of for camouflage of port-wine stain, 2040
Pilonidal Cyst (Brust and Sarner), 2139
Pilonidal Cyst Surgery—A Modification (Cantor) 1492
Pitressin, intrathecal use of for prolongation of spinal anesthesia, 1089
Placebos, Use of in the Local Therapy of Skin Diseases (Abramowitz) 1607
Pneumoperitoneum, Radiographic, in Acute Perforations of the Gastrointestinal Tract (Kornblum) 2726
Poliomyelitis
acute anterior 2603
physical medicine in 1709
Polyps, Colon, Diagnosis and Treatment of (Binkley) 2145
Polyps, Rectal Showing Early Malignant Transformation (Peskin) 1590
Porokeratosis of Mibelli (Barker Huber and Hallinger) 1909
Port-wine Stain of the Face, Permanent Camouflage of by Intradermal Injection of Insoluble Pigments (Tattooing) (Conway) 2040

Postcholecystectomy Syndrome Diagnosis and Management of (Twiss and Carter) 2245
Postlumbar Puncture Headache Management of Severe (Ahearn) 1495
Preservation of the Anal Sphincter Present Status of in Radical Operations for Carcinoma of the Rectum and Rectosigmoid (Wilensky), 2605
Procaine
in acute anterior poliomyelitis 2608
and Diethylaminoethanol Studies on the Pharmacologic Properties of (Papper Brodie Lief and Rovenstine), 1711
in the injured hand 1693
intravenous anesthesia 1699
Penicillin in Hospital Practice A Guide to the Use of (Stollerman Roston, and Toharsky) 2501
Prolapse Complete Following Hysterectomy (Hyams) 2581
Prolongation of spinal anesthesia pitressin for, 1680
Prolonged labor 2601
Protein Metabolism Some Newer Aspects of (Schwimmer and McGavack) 1797
Psychiatric therapy electronarcosis in 2387
Pulmonary Lesions Differential Diagnosis of (Clark) 1587
Pulmonary Pathology as Related to Infant Resuscitation (Schwab Eastman and Etsten) 1703
Pulmonary Tuberculous Spreads Incidence of Following Thoracic Surgery and Anesthesia (Parke Loftus and Bishop) 1685

Radiographic pneumoperitoneum 2726
Radium therapy in the prevention of deafness 2715
Ragweed Hay Fever *see* Hay Fever, Allergy
Ragweed Pollination in the New York Metropolitan District in 1947 Survey of (Walzer Siegel Chait and Walzer) 2019
Rectal polyps 1599
Rectosigmoid *see* Carcinoma Surgery
Rehabilitation *see* Physical Medicine Therapeutics
Renal Dysfunction Role and Control of in Congestive Heart Failure (Leiter) 1803
Resist Beginnings (Masterson) 2408
Rhinitis *see* Allergy
Rhinoplasty Potentialities and Limitations of Corrective (Safian) 2160
Rickettsialpox (Rose) 2266

Scalenus Anticus Syndrome (Judovich) 2382
Schizencephalies with Hydrocephalus (Beswick) 2364
Schizophrenia catatonic 1489
Serologic Tests False for Syphilis in Infants of Treated Mothers (Moon Adams) 1819
Service Contract for Low income Subscribers Advantages of (Goodfriend) 1583
Skeletal muscle painful disorders of 2050
Skin diseases, placebos in local therapy of 1927
Sodium sulfadiazine, sodium morrhuate with in treatment of varicose veins 2619
Sodium morrhuate with sodium sulfadiazine, treatment of varicose veins, 2619
Solar Burns of the Fundi (Turtz) 2489
Sphenopalatine Ganglion Block for the Relief of Painful Vascular and Muscular Spasm with Special Reference to Lumbosacral Pain (Amster) 2475
Spinal Anesthesia *see* Anesthesia
Spinal cord tumor carcinoma of pancreas simulating 2629
Spinal Epidural Infection (Corradini Turney and Browder), 2367
Steven-Johnson Syndrome *see* Erythema
Strangulated hernia 2625
Streptomycin
in Chronic Tuberculosis (Hayes and Parry) 1477
in Dermatology Its Value and Limitations (Combes Canizares Shatin and Kaufman), 2024
in Friedländer bacillus pneumonia 1507
Intraperitoneal Use of (Zingaro) 2518
and Surgery in the Treatment of Tuberculous Joints (Michele and Krueger) 1470
in Tuberculosis (Feldman) 2260
in tuberculous meningitis 2280
Surgery
of advanced carcinoma of the cervix, 1733
for carcinoma of the rectum and rectosigmoid, 2605
of the esophagus 1943
gastric hydrochloric acid interpretations in, 2724
in hypertension 1487
hysterectomy, 2581
intraperitoneal use of streptomycin 2518
Ocular Pathologic Basis of Some Complications of (Snell) 2710
of pancreas 2149
in peptic ulcer, 2153
pharyngo-esophageal diverticulum 1709
pilonidal cyst 1492 2138
postcholecystectomy syndrome 2245
postoperative iridocyclitis 2710
rectosigmoid diverticulitis of 1615
rhinoplasty, 2160
sympathectomy 2278
thoracic anesthesia in 1943
thoracic and anesthesia pulmonary tuberculous spreads following 1685
in tuberculous joints 1470
Sydenham s Chorea phenylethylhydantoin in 2165
Sympathectomy
Selection of Hypertensive Patients for (Russek Southworth and Zohman) 2278
see also Hypertension
Syphilis
interstitial keratitis, 1916
serologic tests in infants 1819
Syphilitic Interstitial Keratitis (Graham Romaine and Rulison) 1916
Systemic disease eye and skin manifestations of 2700

Tachycardia Recurrent Paroxysmal Ventricular (Feibush and Greenberg) 1952
Tattooing
camouflage of port-wine stain 2040
Tattoo Marks Removal of (Lerner) 1937
Teeth and Skin Diseases (Andrews Domonkos and Hopper) 2029
Thephorin
in Allergic Disorders Role of (Gelfand) 1947
tolerance studies 1596
in treatment of reaction to penicillin 1505
see also Allergy
Therapeutics Dynamic in Chronic Disease (Rusk) 1579
Therapy Conferences on 2050
Thouracil Unusual Reaction to (Greenfield) 1501
Thoracic Surgery, Anesthesia in with Special Reference to Surgery of the Esophagus (Lyons) 1943
Thrombo-embolism Venous Treatment of (Cosgriff Cross and Habif) 1483
Tolerance Studies of the Antihistamine Drug Thephorin (Boyd Weissberg and McGavack) 1596
Topical Anesthesia (Combes and Saperstein) 2599
Tropical Diseases of the Gastrointestinal Tract in Veterans (Shookoff) 2133
Tuberculosis
chronic streptomycin in 1477
diabetes complicated by 1613
differential diagnosis of pulmonary lesions 1587
of joints 1470
pulmonary spreads following thoracic surgery and anesthesia 1685
streptomycin in 2260
Tuberculous Meningitis Complicated by Pregnancy (Silverman and Feinblatt) 2280

Urinary Infections in Infants and Children Acute (Campbell) 2397
Urography Value of in Elucidation of Nonurologic Complaints (Swersie) 1607

Vaginal smear carcinoma of the cervix detected by 2407
Vagus Nerves in the Medical and Surgical Therapy of Peptic Ulcer Role of (Winkelstein), 2153
Varicose Veins Treatment of Sodium Morrhuate with Sodium Sulfadiazine in (Myers) 2619
Vasomotor rhinitis *see* Allergy
Venereal Disease
patient physician and 1827
yaws 1920
Venous Thrombo-embolism 1483
Ventricular tachycardia 1952
Virus Diseases
pneumonias 1735
in pregnant mothers 1807

Wolff Parkinson White Syndrome and Organic Heart Disease Coexistence of (Rinzler) 1617

X-ray Injuries The Preventable Occupational Hazard (DeVoe and Corney) 1601

Yaws a Case of in New York City (Post and Sheard) 1920

Editorials

*Alcoholic intoxication chemical tests for 1682
Annual Meeting 1948 1575
*Annual Meeting Photoroentgen Findings at 2018
Antivivisectionists The Menace of the 2127
*Antivivisectionists vigilance concerning, Of This and That 2578
*Atomic medicine seminar of Dr Stafford Warren Radiologic Warfare 2472
*Australian Doctors Nullify Pharmaceutical Benefits Act 2129

Barbiturates as a leading cause of fatal accidental poisoning Fatal Accidental Poisoning 2240

Baer Dr Louis H., on the twelve resolutions of the World Medical Association, Stop Look, Listen, I 5 5
Beginnings, Resist, *239
Birth certificates, 1459
Bard, Miss Emily P., originator of the TB Christmas Seals, 2130

*Calc Have Your 2353
Calorie Nutrition of Adults The Facts About Nutrition 2540
*Campaign, The Tuberculosis 2130
*Cancer, breast, hormone therapy for 15**
Cancer Detection Clinics 1576
*Cancer therapy and high voltage x rays 100 000 000 Volt X-Rays 2353
*Chemical Tests for Alcoholic Intoxication 108
Christmas, 1948 2687
*Comparison of Effects of Margarin and Butter on Weight and Height of Children 15 8
*Confidential Report 1459
*Current attitudes toward the medical profession, Use and Abuse, 2241

Diet Inventory Methods for Doctors, I II Facts About Nutrition, 579, 2091
*Disabilities, Nonservice-Connected a Problem 2577
Disaster Preparedness, The President s Page 23-4
Doctors and the Selective Service Act, *015
Double Taxation, 1906
Draft Boards Again 1681
*Drug combinations, antidepressant and sedative effect Have Your Cake 2353

Economy World, 1793
*Efficacy of Folic Acid Treatment of Macrocytic Anemia Folic Acid vs. Liver Extracts The Present Score, 1907
Examples of Biochemical Interrelationships Among Nutrients, Facts About Nutrition *473
Expansion of health program, Health Deficits Studied *016
*Expert Testimony 2352

Facts About Nutrition, 2131, 2243 *355 *473 *579 2691
Fetal Accidental Poisoning, 2240
*FBI, Wanted by 1794
First Annual Supplement, The 1905
*Folic Acid vs. Liver Extracts The Present Score 1907

*General Electric Laboratories experiments with high voltage x rays 100 000 000 Volt X Rays 2353

*Have Your Cake, 2353
*Hazards, of Irradiation 1678
Hazards of X-Rays, 471
Health, World, 1793
Health Deficits Studied, 2016
*Hormone Therapy for Breast Cancer I Still Experimental, 1877
Hospitals, professional services in 1467
Hospitals, Vulnerability of 2351

Into the Open 576

*Journal of the American Medical Association on the hazards of x-rays, Hazards of X Rays, 2471

*Liebman, Rabbi Joshua Loth, death, Psychosomatic Rheumatism, 1906
*Liver Extracts Folic Acid vs.: The Present Score 1907

*Margarin and butter comparison of 1578
Masterson John J., on National Health Insurance, Resist Beginnings, 2239
*Medical terminology misleading, A Poor Use of Words *120
Menace of the Antivivisectionists The, 2127
Minutes of the House of Delegates, The First Annual Supplement, 1905
Modern Nutrition, 2127
Moore Norman S Facts About Nutrition 2131 *243 35 *4 3 *370 691

National Health Insurance discussed by Dr John J Masterson Resist Beginnings, *239
*N Y State Department of Health Exhibit Photoroentgen Findings at Annual Meeting, *018
Nonservice-connected Disabilities a Problem, 577
*Nurses need for, 1683
Nutrition Facts About 2131 *243 2355 *473 2579 *691

*Of This and That, *578
100,000 000 Volt X Rays 2353
Open Into the 576

Penicillin Treatment of All Forms of Syphilis The Status of *017
*Pharmaceutical Benefits Act Australian Doctors Nullify 1 9
*Photoroentgen Findings at Annual Meeting 2018
Physician heal thyself Psychosomatic Rheumatism 1906
Poisoning, Fetal Accidental 2240
*Poor Use of Word A, 2130
Preparedness Disaster The President s Page 2354
President s Page (Dr Leo F Simpson) 1460 1796, 2354
Professional Services in Hospitals 1457
Prolongation of Life What Price the Mere? **41
Psychosomatic Rheumatism 1906

Radiation Hazards 1678
*Radiologic Warfare 472
Recommended Dietary Allowances 1948, Facts About Nutrition, 355
Resist Beginnings 239

Security of hospitals in case of war Vulnerability of Hospitals, 2351
Selective Service Act Doctors and the *015
*Serum Hepatitis 2680
*Status of Penicillin Treatment of All Forms of Syphilis The 2017
Stop Look Listen, I 576 II 688

Supplement, The First Annual, 1905
*Syphilis The Status of Penicillin Treatment of All Forms 2017

*Taxation, Double, 1906
*Teachers of medicine and their approach Expert Testimony 2352
*Testimony Expert, 235-
*There Is a Need 1683
*Topectomy 1458
*Tuberculosis Campaign, The, *130

United Medical Service announcement, Into the Open 2576
Use and Abuse *241

*Vetera Administration report, Nonservice-connected Disabilities a Problem, 2577
Vulnerability of Hospitals, 2351

*Wanted by the FBI 1794
War possibility and its effect on the medical profession, Disaster Preparedness The President s Page 2354
*Warfare Radiologic, *477
*Warren, Dr Stafford on atomic medicine Radiologic Warfare 2472
*What Price the Mere Prolongation of Life? 2241
*Words A Poor Use of, 2130
World Health and World Economy 1703
World Medical Association Stop Look Listen I II 2575, 2688

X rays, Hazards of *471
*X rays, 100 000 000 Volt 2353

*Editorial Comment.

Necrology

Akkarian, Sarkis H., 1846
Altman John 1846
Allen J Wilford 1846
Altman, Victor Ludwig, 2632
Austin, Alonzo Eugene, 1625
Austin, Eugene Morton, 1960

Baker Charles E., 2528
Bartlett, Frederic Huntington 2528
Bedell, Edward Joseph 2287
Bender William Frederick 2176
Bennett, Allen Rees, 2176
Bixby Bert J 2176
Bluestone, Nathan Bernard, 2062
Brown, Ethel Doty 263
Brown, Sidney Pope 1900

Capron, C Gray, 2736
Caspe Maurice, 2176
Cochrane, William Blanchard 2632
Cooke Willis S 2287
Couch William Cornelius, 1846
Cronson, Reuben 1740
Cusick, Joseph F., 2528

de Forest, Henry Pelouze 1625
De Klyn Charles, 2176
Diefendorf Fred S., 1816
Dineen, Paul, 2287
Dowkontt, Clifford Ferring, 1846
Downey James Maurice 2287

Edwards John William, 2287
Engel Eva H., 2736
Evans Archibald P., 2632

Farrell Walter J., 1960
Fifield, H Leland 2176
Flake, Edwin Howe 1025
Fitch, Charles Wilmer 1740
Flood Alice M., 1740
Friedman, Edward Louis 1900

Furst, Sidney Jay 2412

Garretson, William Van Pelt, 1510
Gartner Albert A 2175
Gettinger Joseph H 2632
Glasberg Oswald, 1846
Gordon Onslow Allen 1740
Grassheim Kurt M 2738
Greene Frederick Howell 1625
Gross John Conrad 1960

Hager William Christian 2287
Halloran Walter J 2738
Hammer Julius 2528
Healy Maurice Edward 1960
Hoenig Matthew John 1960
Holland Henry Steers 2175
Hopkins Heywood Hill 2062

Iler George Hills 1960

Judd John Wesley 1510

Kaufman Benjamin, 2287
Kellogg Edward Leland 1960
Kellogg Edwin Welles 2175
Kelly Aquin S 1846
Kolodny Anatole, 1740
Korman Samuel H. 2528

Lebhar Norman J 1846
Lee George Bolling 1846
Lehman Max, 2528
Leighton Frederick 1510
Lenz George 2528
Little William 2528

Mandelberg Joseph 2738
Mannel Anton Frederick, 1625
Marburg, Otto 1625
Martin Arthur Chalmers 1847
Martinson I Julius 2062
McCullagh Samuel 1846
Meeker Louise Hopkins 2287
Miller, James Alexander 1847
Mulcahy Bernard Joseph 2062

Nelson Ray Sixtus 1625
Norton Nathaniel Read 2412

O Regan John Alfred 2412
Orton Samuel Torrey 2738

Persons Ray Eugene 2632
Phillips Charles Bates 1510
Pick Rudolph L 2412
Pines Charles 2062
Pototzky Carl 2412
Povitzky Olga Raissa 1626
Prairie Charles F 1740
Prince Howard L 2738

Reinstein Anna Magilowa 1626
Renfrew F Ward 1510

Shellin Irving I 1847
Sheridan, Joseph P 2738
Smith Homer W 2287
Smith William M 1626
Snyder William H 2738
Spoor Walter D 2175
Stage Lon E 2175
Stewart Alexander M 2412
Stewart Samuel 1510
Strong Franklin Raphael, 174
Sugarman William Henry 16

Tenney Willis Ashton 1626
Thomas, Stanley Bishop 2412
Treder William Carl 1847
Trotter Homer A 2632
Turner, Henry Brown 2528

Wahl Albert Leopold 1847
Wallerstein Abraham 1974
Washeim Henry Jr 2632
Waterfield Hanford 2062
Weil Alfred 2738
Wells Stephen Whitaker 1620
Wertheim Hippolyte Marcus,
Westhoff August W F 1626
Wiener Alfred 1847

Zacharie Charles Cowing 263
Zicarelli Joseph 1740

Reviews of Books

Adler Francis H. Gifford s Textbook of Ophthalmology 2646
Alexander Harry L Synopsis of Allergy 1637
Allergy Synopsis of (Alexander) 1637
Applied Physiology (Wright) 2644
Arthritis and Related Conditions (Bach) 1637

Bach Theodore Franklin Arthritis and Related Conditions 1637
Bacteriology, Diagnostic A Textbook for Isolation and Identification of Pathogenic Bacteria for Medical Bacteriology *Laboratories (Schaub and Foley) 1637*
Ballenger Howard Charles Manual of Otology Rhinology and Laryngology *1757*
Bancroft Frederic W, and Murray, Clay Ray Ed Surgical Treatment of the Motor Skeletal System, 2648
Beck Alfred C *Obstetrical Practice 2646*
Becker, S William and Obermayer Maximilian E Modern Dermatology and Syphilology 2644
Behrman Howard T Dermatologic Clues to Internal Disease 1638
Beitrage zur Kenntnis der Blutgerinnung (Rieben) 2648
Bell E T Textbook of Pathology 1757
Bibby Cyril Sex Education A Guide for Parents Teachers and Youth Leaders 1530
Bierman William Physical Medicine in General Practice *2308*
Biering Walter L Ed Rypins Medical Licensure Examinations Topical Summaries Questions and Answers Containing for the First Time a Chapter on Psychiatry Also Numerous Text Changes Throughout Incorporating Current Advances 2306
Bone and Bones Fundamentals of Bone Biology (Weinmann and Sicher) 1640
Boyd William Surgical Pathology 1754
Browne O Donel T D The Rotunda Hospital 1745-1945 2308
Burstein Julius and Bloom Nathan Illustrative Electrocardiography 2644

Cardiovascular Diseases Atlas of Correlation of Clinical Electrocardiography and Cardiac Roentgenology with Clinical History and Autopsy Findings (Treiger), 1638
Child Offenders A Study in Diagnosis and Treatment (Goldberg) 2644
Clendening Logan Methods of Diagnosis 1530
Clinical Pathology, Recent Advances in (European Association of Clinical Pathologists) 1640
Clinical Practice in Infectious Diseases for Students Practitioners and Medical Officers (Harries and Mitman) 1754
Contagious Diseases Manual of Common (Stimson) 1754
Cook Donald Ulcer The Primary Cause of Gastric and *Duodenal Ulcer Diagnosis* Medical and Surgical Treatment Prevention 2648
Curare Its History Nature and Clinical Use (McIntyre) 1637

DallaValle, J M The Industrial Environment and Its Control 2648
Davidoff Leo M and Dyke, Cornelius G The Normal Encephalogram, 2644
Dermatologic Clues to Internal Disease (Behrman) 1
Developmental Diagnosis Normal and Abnormal Development Clinical Methods and Pediatric *Applications (Gesell and Amatruda), 1754*
Diseases of the Chest With Emphasis on X-ray D (Rubin) 2308
Diseases Transmitted from Animals to Man (Hull), 1
Doctor Discusses Morals The (Pugh) 2306

Eggston Andrew A. and Wolff Dorothy pathology of Ear Nose and Throat 1754
Endocrinology Essentials of (Grollman) 1640
Endocrinology of Neoplastic Diseases A Symposi Eighteen Authors (Twombly and Pack Ed.) 2646
European Association of Clinical Pathologist cent Advances in Clinical Pathology 1640
Exercises Remedial Massage and (Tidy) 1530

Fishbein *Morris History* of American Medica ciation 1752
Foley M Kathleen and Schaub Gilbert Dis Bacteriology 1637
Food and Health (Sherman) 1638
Freilich Ellis B and Coe George C Manual o cal Diagnosis with Special Consideration of the He Lungs 2646
Gastritis (Schindler) 1638
Gesell Arnold and Amatruda Catherine D mental Diagnosis Normal and Abnormal Child D ment 1754
Gifford s Textbook of Ophthalmology (Adler) 2646
Goldberg, Harriet L Child Offenders A St *Diagnosis and Treatment* 2644
Goldberger Emanuel Unipolar Lead Electrocardiography Including Standard Leads Unipolar Ex Leads and Multiple Unipolar Precordial Leads 264
Goni Adalberto R Myasthenia Gravis 1757
Gordon William Hyatt What Is Heart Dise Handbook for the Heart Patient 1530
Grollman Arthur Essentials of Endocrinology
Gynecology With a Section on Female Urology (Wi 1638

Hamilton William F Textbook of Human Phy 2648
Harries E H R and Mitman M Clinical Pra Infectious Diseases 1754
Headache (Moench) 2648
Health Insurance in the United States (Sinai Anders Dollar) 2646
Heart Disease What Is A Handbook for the Heart (Gordon) 1530
Hematology Color Atlas of With Brief Clinical D tions of Various Diseases (Kracke) 1637
Heparin in Treatment of Thrombosis An Account Chemistry Physiology and Application in M (Jorpes) 1530
Histopathology of Ear Nose and Throat (Eggsto Wolff) 1754
History of American Medical Association 1847 t (Fishbein) 1752

Essay of the Medical Society of the County of Westchester (Erdway) 2306
Etil, Thomas G Diseases Transmitted from Animals to Man 1637
Exton Physiology Textbook of (Hamilton) 648
Eyesight Today (Lecron and Bordeaux) *644

Illustrations of Regional Anatomy (Jamieson) 648
Illustrative Electrocardiography (Burstein and Bloom) *644
Industrial Environment and Its Control The (Dallavalle) 2305

Johnson, E. B.: Illustrations of Regional Anatomy 648
Johnson, Wingate M Years after Fifty 1754
Jones, J. Paul Heparin in the Treatment of Thrombosis An Account of Its Chemistry Physiology and Application in Medicine 1530

Kegel, Alfred C., Pomeroy, Wardell B. and Martin, Clyde E. Sexual Behavior in the Human Male 308
Kelser, Josie A Penicillin Therapy Including Streptomycin, Tyrothricin, and Other Antibiotic Therapy 1638
Kempchen der Larvalstichen Würmer in Man by (Gros) 1754
Kerr, Roy R. Color Atlas of Histopathology With Brief Clinical Descriptions of Various Diseases 163
Kerr, Hans A. Kompendium der Parasitischen Würmer des Menschen, 1754

Lemon, Leslie M., and Bordeaux Jean Hygiene Today *644
Lieman, Joshua L. Peace of Mind, 1637

Manual of Otology Rhinology and Laryngology (Ballenger) 1737
Manual of Physical Diagnosis with Special Consideration of the Heart and Lungs (Preffich and Coe) *646
Massage and Remedial Exercises. In Medical and Surgical Conditions (Tidy) 1530
McIndoe, A. H. Curare Its History Nature and Clinical Use, 1637
Medical Clinics of North America. Nationwide Number 1640
Medical Clinics of North America. New York Number 1640
Mental Mischief and Emotional Conflicts Psychiatry and Psychology in Plain English (Sadler) 1638
Mirakrr, H. Houston: Fundamentals of Clinical Neurology 1639
Methods of Diagnosis (Cleandening) 1530
Modern Dermatology and Syphilology (Becker and Obermayer) 2644
Moench Louis G Headache *648
Moreno, J. L. Psychodrama 2644
Myasthenia Gravis (Goni) 1757

Neurology Fundamentals of Clinical (Merritt) 1638
Neurology Psychiatry and Neurosurgery 1946 Year Book of (Reese, Masten Lewis and Bailey) 1640
Normal Encephalogram, The (Davidoff and Dyke) 644

Obstetrical Practice (Beck) 2040
Oehrsberg Nelse F Urology in General Practice, 1638
Overcoming Stammering (Pellman) 1754

Pathology, A Textbook of (Bell) 1757
Peace of Mind (Liebman) 1637
Pediatric Gynecology (Schauffler) 648
Pellman Charles Overcoming Stammering, 1754
Penicillin Therapy Including Streptomycin, Tyrothricin, and Other Antibiotic Therapy (Kolmer) 1637
Peripheral Vascular Diseases (Samuels) 1754
Physical Medicine in General Practice (Bierman) 2305
Potter, Edwin L. Rh: Its Relation to Congenital Hemolytic Disease and to Intragroup Transfusion Reactions, 1640
P-Q-R-S-T A Guide to Electrocardiogram Interpretation (Hinsman) 1757
Preoperative and Postoperative Care (Touraine and Wagner) 2306
Problème Des Selbstmordes (Schwarz) 2306
Psychodrama (Moreno) 2644
Pyne, Winfield Scott The Doctor Discusses Morals 2307

Redway Laurance D History of the Medical Society of the County of Westchester, 2306
Reese, Hans H., Masten Mabel G., Lewis, Nolan D. C., and Bailey Percival: 1946 Year Book of Neurology Psychiatry and Neurosurgery, 1640
Rehabilitation Through Better Nutri (Spies) 1638
Rh: Its Relation to Congenital Hemolytic Disease and to Intragroup Transfusion Reacti
Rirsman W. K. Beitrage zur P *645
Riesman Joseph E. P-Q-R-S-T A Guide to Electrocardiogram Interpretation 175
Robinson Victor White Caps. The Story of Nursing, 646
Rot inda Hospital, 1 45-1945 The (Browne) *308
Rubin Ely H. Diseases of the Chest With Emphasis on X-ray Diagnosis *308
Rypins Medical Censure Examination Typical Summaries Questions, and Answers. (Blerring, Ed.) 2306

Sadler, William S. Mental Mischief and Emotional Conflict 1638
Samuels, Basil S. Peripheral Vascular Diseases 1754
Schlagle, Clement and Foley M. Kathleen: Diagnostic Bacteriology 1637
Schauffler, Goodrich C. Pediatric Gynecology 648
Schindler, Rudolf Gastritis 1638
Schwarz, Fritz Problème Des Selbstmordes 2306
Sex Education A Guide for Parents Teachers and Youth Leaders (Bibby) 1530
Sexual Behavior in the Human Male (Kinsey Pomeroy and Martin) *308
Shuman, Henry C. Food and Health, 1638
Sigerist, Henry E. Anderson Odin W. and Dollan, Milton I. Health Insurance in the United States 2646
Spies, Tom D. Rehabilitation Through Better Nutrition 1638
Standard Method of Division of Laboratories and Research of New York State Department of Health (Wadsworth) 1637
Stimson, Phillip Morey Manual of Common Contagious Diseases 1 34
Surgical Anatomy (Boyd) 1754
Surgical Treatment of the Motor-Skeletal System (Bancroft and Murray Ed.) 2648

Tidy, Noel M. Massage and Remedial Exercises. In Medical and Surgical Conditions 1530
Tolbert, William J. and Wagner, Frederick B., Jr. Preoperative and Postoperative Care 2306
Touraine, Irving J. Atlas of Cardiovascular Diseases 1757
Twombly Gray H. and Pack, George T., Ed. Endocrinology of Neoplastic Diseases A Symposium by Eighteen Authors, 646

Ulcer The Primary Cause of Gastric and Duodenal Ulcer Diagnosis, Medical and Surgical Treatment, Prevention (Cook) 2648
Unipolar Leads Electrocardiography Including Standard Leads, Unipolar Extremity Leads and Multiple Unipolar Precordial Lead (Goldberger) 2646
Urology in General Practice (Ockerblad) 1638

Wadsworth Augustus B.: Standard Methods of the Division of Laboratories and Research of the New York State Department of Health, 1637
Weinmann, Joseph P. and Sicher, Harry Bone and Bones Fundamentals of Bone Biology 1640
Wharton Lawrence R. Gynecology With a Section on Female Urology 1638
What Is Psychology A Basic Survey (Wolff) 2646
White Caps, The Story of Nursing (Robinson) 2646
Wolff Werner What Is Psychology A Basic Survey 2646
Wright Samson Applied Physiology 2644

Years After Fifty (Johnson) 1754

State Society

Announcements *404, *418

Council Committees for 1948–1949 2283
County Society Officers 1532 1642 1758, 1868, 1980 2078 2204 2310 *420 2542 2650 2762

District Branch Meetings 1793, 1866, 1958 2060

Medical Care Insurance 1509 1843
Minutes of the Council, Abstract of
May meeting, 1632
June meeting 2184
September meeting, 2508
October meeting, 2745
Minutes of the House of Delegates September 1 Part II, p. 1–13 (see p 2 for Index)

President Page (Simpson)
State Society Officers, 1430 2102 2214, 2320, 438–*

NECROLOGY

C Gray Capron, M D, of Utica, died on July 10 Dr Capron was eighty-one years old He was graduated from Hahnemann Medical College of Philadelphia in 1890 and at the time of his death was a member of the Utica Academy of Medicine, the New York State and Oneida County Medical Societies, and the American Medical Association

Eva H Engel, M D, New York City, died on October 20 at the age of thirty-nine Dr Engel was graduated from the University of Bern, Switzerland, in 1935 She was a member of the American Medical Association, the American Psychiatric Association, the New York Society of Clinical Psychiatry, and the New York State and County Medical Societies

Kurt M Grassheim, M D, of New Rochelle, aged fifty-one, died on November 15 Dr Grassheim was graduated from the University of Frankfurt in 1921 and came to the United States in 1938 He was a member of the American Medical Association and the New York State and Westchester County Medical Societies

Walter J Halloran, M D, died on November 14 at his Yonkers home His age was fifty-two years After receiving his medical degree from Fordham University in 1918, he served with the Army Medical Corps in World War I Since 1919 Dr Halloran had been a member of the staff of St John's Riverside Hospital, Yonkers, and for a long period had been medical examiner to the Yonkers Civil Service Commission He was a fellow of the American College of Surgeons, and a member of the American Medical Association, the New York State and Westchester County Medical Societies, the Yonkers Practitioners Club, and the Yonkers Academy of Medicine

Joseph Mandelberg, M D, of Brooklyn, died on November 12 at the age of fifty-five Dr Mandelberg was graduated from Cornell University Medical College in 1919

Howard L Prince, M D, physician and surgeon in Rochester for over thirty-nine years, died on November 18 at the age of sixty-three Dr Prince was graduated from Cornell University Medical College in 1907 Until his retirement last April, he had been a consultant surgeon on the staffs of Strong Memorial, Genesee, Rochester General, and Tompkins County Memorial Hospitals He was a member of the American Medical Association, the New York State and Monroe County Medical Societies, the Utica Pathological Society, and the Utica Academy of Medicine

Joseph P Sheridan, M D, seventy-eight-year-old physician of Queens, died on November 13 Dr Sheridan, a graduate of New York University College of Medicine in 1892, was a member of the staff of St John's Hospital, Brooklyn, until his retirement a year ago He had also been chief diagnostician for the New York City Health Department in Queens Dr Sheridan was a member of the American Medical Association and the New York State and Queens County Medical Societies

William H Snyder, M D, died at his Brooklyn home on November 12 He was eighty-six years old Dr Snyder, former senior surgeon at Brooklyn Eye and Ear Hospital and a member of the board of directors of that hospital, was graduated from the Long Island College Hospital in 1888 He was also a member of the staffs of St Christopher's, St Catherine's, St John's, and the Holy Family Hospitals and St John's Dispensary Dr Snyder was a member of the American Medical Association and the New York State and Kings County Medical Societies

Samuel Torrey Orton, M D, sixty-nine-year-old New York neuropsychiatrist who had made notable contributions to the study and correction of reading, writing, and speech difficulties in children, died November 17 Dr Orton, recently retired, received his medical degree from the University of Pennsylvania in 1905 and was awarded an honorary doctor of science from that institution in 1945 Before coming to New York in 1927, he held such positions as pathologist and clinical director of the Worcester Massachusetts, State Hospital, instructor of neuropathology at Harvard Medical School, clinical director and pathologist of the Department of Nervous and Mental Diseases of Pennsylvania Hospital, Philadelphia, professor of psychiatry at Iowa State University, and director of Iowa State Psychopathic Hospital From 1928 to 1936 he was professor of neurology and neuropathology at the College of Physicians and Surgeons, Columbia University, and was also at one time senior attending neurologist of the New York Neurological Institute

Dr Orton was a past president of the American Psychiatric Association and the Association for Research in Mental and Nervous Diseases He was also a member of the American Medical Association, the American Neurological Society, the New York Academy of Medicine, the New York Neurological Society, the New York Psychiatric Society, the New York Society for Clinical Psychiatry, and the New York State and County Medical Societies

Alfred Weil, M D, of New York City, died on November 3 at the age of sixty-four Dr Weil, an x-ray specialist and diagnostician, was graduated from the University of Heidelberg in 1907 He was a member of the American Medical Association and the New York State and County Medical Societies

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NUMBER OF PHYSICIANS ACCORDING TO STATES

According to a tabulation from the punch card system being developed by the staff of the Bureau of Medical Economic Research of the A M A, there were 199,755 physicians in the United States as of approximately June 1, 1948

At this stage of the Bureau's operations, one important statistical fact emerges The (approximate) number of physicians in the U S is now 17 per cent greater than the 170,163 shown in the 1940 A M A Directory, the population of the country has increased only 12 per cent since 1940 The approximate number of physicians in New York State in May-June, 1948, is stated to be 30,970 Next in order is California with 16,06 Pennsylvania with 14,633, and Illinois with 13,307

MEDICAL NEWS

Approve Grants for Medical Research

FEDERAL Security Administrator Oscar R Ewing announced recently that Surgeon General Leonard A. Scheele of the Public Health Service has approved 37 grants of funds totaling $1,[illegible],71[illegible] for research in medical and related scientific fields. The grants will help finance the continuation of research projects already under way at institutions in 15 states.

Awards made to institutions in New York State include University of Buffalo Buffalo $8,500 purification and isolation of Rh substances and blood group specific substances New York University New York City, $10 422, effect of insulin and other factors on reabsorption of glucose by renal tubules Mount Sinai Hospital, New York City, $2 610 the role of homeostasis in the pathogenesis of some visceral lesions University of Buffalo Buffalo $5,985 pathogenesis and treatment of gout Albany Medical College Albany, $4,500, chronic remote excitation of abdominal sympathetic and parasympathetic nervous systems.

Also University of Rochester $20 038, iodinated organic compounds as contrast media for radiographic diagnoses Columbia University, College of Physicians and Surgeons New York City $19 440 therapeutic properties of streptomycin in human tuberculosis New York University $27,985 biologic aspects of schistosomiasis, and New York University $1 480 treatment of tuberculosis in children with streptomycin promizole and PAS

American College of Surgeons Confers Fellowships

AT THE thirty fourth convocation of the American College of Surgeons, held October 22 in Los Angeles, 943 fellowships and seven honorary fellowships were conferred.

In order to qualify for fellowship in the American College of Surgeons, a surgeon must be a graduate of an acceptable medical school be licensed to practice in his respective state, province or country or be a medical officer of a Federal service must have completed three or more years in training in surgery in hospitals approved by the College must devote at least half of his practice to surgery, and must have spent seven or more years after graduation in medicine, devoted to special training and practice

Fellowships were conferred on 129 initiates from New York State.

Nominate Dr Jaques for A.M.A Award

THE name of Dr Arthur D Jaques of Lynbrook, was submitted by the Medical Society of State of New York for recognition by the American Medical Association as the nation s Outstanding General Practitioner for 1949 Recommended by the Nassau County Medical Society Dr Jaques was selected by the Council of the State Society and his name forwarded to the Board of Trustees of the A.M.A. From the names submitted by each state, the House of Delegates of the A.M A., at its interim session in St. Louis, November 30 to December 3 made the final selection.

Dr Jaques, seventy two began general practice in Lynbrook and has served that area from October 1900 until the present. He has spent 50 years in active practice during which he delivered approximately 2,500 babies. He received his medical training at the Long Island College of Medicine.

To Award Prize for Research Article

A $500 prize will be awarded by the National Society for Medical Research for the best article published in a popular magazine during the period January 1 to May 1 1949 which describes the growth of a medical development including an account of the experimental work leading to its realization.

For complete details and entry blanks write to National Society for Medical Research 25 East Washington Street, Chicago 2, Illinois.

MEETINGS

PAST

New York Academy of Sciences Division of Mycology

The Division of Mycology of the New York Academy of Sciences held its inaugural meeting on October 22. Dr Norman Conant, Duke University gave a lecture on 'Sporotrichosis—Clinical Epidermologic, and Immunologic Aspects of the Infection."

Officers elected were Dr Frederick Reiss New York University School of Medicine, president, and Dr Royal M. Montgomery Polyclinic Hospital secretary

Eastern New York Eye, Ear, Nose and Throat Association

The 158th regular meeting of the Eastern New York Eye, Ear, Nose and Throat Association was held in Troy on November 4 Guest speakers were Dr Willis S Knighton, New York City, who spoke on "Conservation of Sight," and Dr Marvin Jones, New York City, who discussed "Conservation of Hearing"

Beth-El Hospital, Clinical Society

Under the auspices of the Clinical Society of the th-El Hospital, Brooklyn, the annual Public alth Week for the Laity was held from November to 11, with four scientific papers presented peakers and their topics were Dr Philip Levin, esearch director, Ortho Products Company, "The th Factor", Dr Benjamin J Ashe, Goldwater Memorial Hospital, New York, "Diabetes", Dr Leo Taran, chief, Children's Cardiac Clinic, Kings County Hospital, Brooklyn, "Rheumatic Fever," and Dr I C Rubin, Mount Sinai Hospital, New York, "Menopause"

Society of Medical Jurisprudence

At a meeting of the Society of Medical Jurisprudence held November 8 in New York City, the following papers were presented "Radioactive Iodine Use and Safeguard in Therapeutic Dosage in Hyperthyroidism and in Cancer of the Thyroid and Its Metastases," Dr Samuel Martin Seidlin, Montefiore Hospital, and "Recent Advances and New Problems in the Medical Use of Radioisotopes," Dr Bernard Roswit, chief of the radiotherapy department, Veterans Administration Hospital, the Bronx.

New York Council of Surgeons

Dr Albert Lesser, assistant professor of surgery, New York Medical College, spoke on "Diagnosis and Management of Peripheral Vascular Emergencies of the Extremities" at a meeting sponsored by the New York Council of Surgeons, November 9, at Parkchester General Hospital, the Bronx

On November 23, Dr Abraham P Matusow, assistant clinical professor of otorhinolaryngology, New York Medical College, spoke on "Emergencies in Otorhinolaryngology and Related Plastic Surgery and Their Management by the General Practitioner"

New York State Society of Anesthesiologists

The third Postgraduate Assembly of the New York State Society of Anesthesiologists was held December 9 and 10 in New York City Topics discussed included "Acute Cardiac Death in Anesthesia," "Mechanism of the Action of Volatile Anesthetics," "Implications of Recent Trends in Pharmacology," "The Pathology of Anoxia and Anesthesia," "Recent Advances in Pre- and Postoperative Care," "Spinal Anesthesia," "Diagnostic and Therapeutic Block in Intractable Pain," and "Curare"

FUTURE

New York Academy of Medicine

"The Future in Medicine" is the theme of the fourteenth series of Lectures to the Laity, being sponsored during November, December, January, and February by the New York Academy of Medicine

Lectures to be given include

December 23—"Science Under Dictatorship," Dr Leo Alexander, Boston State Hospital, Boston, Massachusetts

January 13—"Blood and Man," William C Boyd, Ph D , Boston University School of Medicine, Boston Massachusetts

January 27—"The Future of Nuclear Energy," John Ray Dunning, Ph D , Columbia University, New York City

February 10—"The Criminal in Our Midst," Dr George E Gardner, Judge Baker Guidance Center, Boston, Massachusetts

Previous lectures in the series have included "Some Problems in Law and Medicine," Robert P Patterson, former U S Secretary of War, and "The Endocrines Masters or Servants"," Dr Ephraim Shorr, Cornell University Medical College, New York City

American Laryngological, Rhinological and Otological Society, Inc

The Eastern Section of the American Laryngological, Rhinological and Otological Society, Inc , will meet January 7, 1949, in Boston, Massachusetts The midwinter Council meeting will be held in New York City on January 8, 1949

American College of Physicians

The American College of Physicians will conduct its thirtieth annual session in New York City, March 28 through April 1, 1949 Dr Franklin M Hanger, Jr , New York City, is chairman for local arrangements of clinics and panel discussions Dr Walter W Palmer, director of the Public Health Research Institute of the City of New York and professor emeritus, Columbia University College of Physicians and Surgeons, who is president of the College, will be in charge of the program of morning lectures and afternoon general sessions

PERSONALITIES

Honored

Dr Simon Riesefeld Blatteis, Brooklyn at a dinner at the Waldorf-Astoria, New York City, on December 6, to mark his fifty years in the practice of medicine

Appointed

Dr Samuel A Brown, New York City former president of the New York Academy of Medicine and dean emeritus of the New York University College of Medicine, as acting chairman of the Board of Trustees of the New York University-Bellevue Medical Center Dr Jacob M Ravid, formerly pathologist at the Izrael-Zion Hospital, Brooklyn, as pathologist and director of laboratories at St Clare's Hospital, New York City Dr Donal Sheehan, formerly director of the Commonwealth Fund, as chairman of the Scientific Committee, New York University-Bellevue Medical Center

Elected

As members of the board of governors of the

American College of Surgeons for terms ending in 1951—Dr Walter T Dannreither, Dr Philip D Wilson, and Dr Marvin E Jones all of New York City, and Dr Eldridge H Campbell Albany

Speakers

Dr. Frank E. Adair, associate professor of surgery, Cornell University Medical College, New York City at a symposium on 'Cancer Is Curable' at the meeting of the American College of Surgeons in Los Angeles California, on October 19 Dr John N Evans, Brooklyn, on "Circulatory Aspects of the Glaucoma Problem" as the Mark J Schoonberg Memorial Lecture, December 6 under the joint sponsorship of the New York Society for Clinical Ophthalmology and the National Society for the Prevention of Blindness Dr John H Garlock, New York City at the third Mexican Congress of Medicine November 8 to 12 in Mexico City where he was acting president of the Congress for one day gave a paper on 'The Surgical Treatment of Duodenal Ulcer' and held operative clinics at one of the Mexico City hospitals.

Dr Ralph Waldo Gerard professor of physiology University of Chicago Medical School, on Physiology and Psychiatry November 8, as the annual Menas S Gregory Lecture sponsored by the New York University College of Medicine Dr Foster Murray director of tuberculosis at the Kingston Avenue Hospital Brooklyn November 9 at a meeting sponsored by the American College of Chest Physicians Dr Joseph I Pascal New York City, recently returned from Europe after giving lectures on 'A Graphic Study of the Ocular Muscles' and 'A New Static and Dynamic Muscle Schema' at the Section on Ophthalmology at the Centennial Medical Congress of the Hungarian Medical Society at the annual convention of the Swiss Ophthalmological Society and at a meeting of the Ophthalmological Society of Paris.

New Offices

Dr Robert Hubbard World War II veteran formerly of Buffalo, practice of dermatology in Utica Dr James Huck, Utica who served with the U S Navy Medical Corps general practice in Herkimer Dr William C Karl formerly a flight surgeon with the Air Transport Command in the Pacific Theater practice of internal medicine in Williston Park Dr William J Waters, Navy veteran who recently completed postgraduate work at Harvard Medical School practice of pediatrics in Syracuse.

ADOPTION IN NEW YORK CITY

To supply a comprehensive study of the adoption situation, the New York Academy of Medicine, the United Hospital Fund of New York and the Welfare Council of New York City in 1946 jointly appointed the New York City Committee on Adoptions to make a broad inquiry into adoptions and related services. The report of this Committee has just been published by the Welfare Council

Thirty-seven public and private agencies working in the New York City adoption field and the social service departments of 11 hospitals participated in the report. Miss Katharine F Lenroot, chief of the Children's Bureau of the Federal Security Agency said, in her foreword to the report that the recommendations taken together represent an approach to adoption not as a problem for social work alone, or law or medicine or any separate professional group but rather as one for action by the whole community

The report is chiefly concerned with a study of the services in New York City and philosophy and conditions of adoption practice Conceding that approved facilities for adoptions in New York are inadequate the Committee agrees that the important process of adoption should be handled through authorized agencies chartered by the State and subject to inspection and supervision by the State Department of Welfare Of particular interest to the medical profession was the recommendation that the medical legal nursing, social work professions and the clergy be requested to study questions of ethical practice in relation to the care of unmarried mothers and the placement of children in adoption with a view to informing members directly as to accepted procedure and the use of authorized agencies

The report pointed out certain weaknesses in the law which, at the present time does not penalize or forbid such unethical practices as the placing of children for adoption at a price The committee has asked that certain principles be incorporated in the law namely notification of an appropriate public agency by persons who have taken a child for adoption within two weeks after they receive the child in their home prompt investigation by an appropriate social agency of the placement of a child in a prospective adoption home and requiring investigation before the adoption becomes final in the court. The committee also asks for legal procedures for the termination of unsatisfactory placements and of course, prevention of placements of children for private profit.

HOSPITAL NEWS

1948 Directory Shows Growth of Hospitals

THE almost 18,000,000 Americans admitted into the 6,173 hospitals of the United States in 1947 represent nearly a 100 per cent increase over the 9,221,517 patients admitted to hospitals in 1937, ten years ago These figures, along with many others illustrating the increased recognition of the place of hospitals in the nation's health and welfare, appear in the 1948 *American Hospital Directory*

According to the statistics, last year one in every eight Americans received hospital care Approximately 16,000,000 patients, 2,000,000 more than in 1946, were admitted to general hospitals in 1947 Rising prices left their mark, as the average cost of caring for a patient for one day in a general hospital jumped from $9 39 in 1946 to $11 09 in 1947, leaving a daily deficit of $1 38 per patient

Hospitals spent about $400,000,000 more in 1947 than in 1946, due to higher wages, higher prices, and expanded services It is significant that the average patient entering a general hospital last year stayed for only eight days, as compared to 9 1 days in 1946 The Association concludes that this shorter hospital stay results from the increasing tendency of patients to enter hospitals in earlier stages of illness, as well as from wider recognition of the value of hospitals, improved treatment methods, and early ambulation

Building Work at 31 Hospitals to Get U S Aid

CONSTRUCTION projects for 11 hospitals in the metropolitan New York area, estimated to cost $2,753,411, and for 20 upstate hospitals, estimated to cost $15,832,613, were approved for Federal aid by the State Joint Hospital Survey and Planning Commission in Albany on November 20

Dr John J Bourke, commission director, said Federal grants would amount to about a third of the total cost. The remainder will be borne by the projects' sponsors

Slated for the most aid in the New York area is the Wyckoff Heights Hospital, Brooklyn, where the addition of a 100-bed wing is estimated to cost $1,501,000 A $700,000 thirty-six-bed addition to the Jamaica General Hospital, Jamaica, Queens, and a $241,450 forty-bassinet nursery for Mount Sinai Hospital, have also been approved

Other projects approved for the New York area are a $34,492 sixty-bassinet nursery for Kings County Hospital, Brooklyn, a $14,766 sixty-bassinet nursery for Harlem Hospital, a $15,968 twenty-four-bassinet nursery for Queens General Hospital, Jamaica, Queens, a $15,868 thirty-two-bassinet nursery for Fordham Hospital, the Bronx

Also, a $7,987, twenty-five bassinet nursery for Lincoln Hospital, the Bronx, a $55,000, twenty-bassinet nursery for Presbyterian Hospital in the City of New York, and a $29,280 thirty-five-bassinet nursery for Bellevue Hospital

The thirty-one projects were selected to make up the first and second years goal for a five-year, Statewide construction program that the commission recommended in a report issued last June The commission estimated that the long-range program it recommended would cost approximately $750,000,000 and would provide 54,000 additional hospital beds

Construction of new general hospitals and additions to existing plants constitute the majority of the projects Alterations to existing hospitals to provide nurseries for premature newborn infants, construction of several public health centers and laboratories, and modernization of some hospitals throughout the State make up the remainder of the projects

NEWS NOTES

Mount Sinai Hospital, New York City, has announced the appointment of Dr Sidney M Samis as assistant director Dr Samis, who has served in administrative posts at Montefiore Hospital and the Union Health Center in New York, was a Medical Corps captain during the war

The cornerstone of a new $1,100,000 building at Hillside Hospital, which will increase the capacity of the hospital from 88 to 172 beds, was laid October 24 by Leon Lowenstein, a vice-president of the hospital, on its grounds at Bellerose, Queens At the same time affiliation of Hillside Hospital with the Federation of Jewish Philanthropies of New York was announced

Tumor clinics attached to six Buffalo area hospitals are cooperating in the nation-wide effort to arrest cancer With better diagnosis and treatment of cancer patients as their goal, the clinics are among more than 400 scattered throughout the United States which conform to the standards set up by the American College of Surgeons They are located at Meyer Memorial, General, Our Lady of Victory, Millard Fillmore, Children's, and Mercy Hospitals

Dr Cameron Guild, formerly on the staff of the National Tuberculosis Association in New York City, and for the past year with the medical section of the Veterans Administration, has been appointed to the post of chief of professional services at Sunmount Veterans Hospital in Tupper Lake

Dr William H Shehadi, formerly director of radiology at Mount Vernon Hospital, Mount Vernon, has accepted the position of professor of radiology and director of the department at New York Polyclinic Medical School and Hospital in New York City

WOMAN'S AUXILIARY

TO THE MEDICAL SOCIETY OF THE STATE NEW YORK

A M.A Woman s Auxiliary Holds Conference

THE fifth annual conference of state presidents presidents-elect and chairmen of standing committees of the Woman s Auxiliary to the American Medical Association was held in Chicago Illinois on November 4 and 5 with Mrs I uther H Kice New York, national president in charge

The New York State Woman s Auxiliary was represented by Mrs Alfred L. Madden national parliamentarian Mrs. Harry F Pohlmann national program chairman, Mrs. Edgar M Neptune State president Mrs William J Lavelle president-elect, and Mrs Kice

Speakers at the conference included 'School Health Problems," Fred \ Hein Ph.D , Report on the Hoover Commission Mr Thomas A Hendricks, secretary of the Council on Medical Service 'The Forces Behind the Drive for Socialized Medicine and Education Mr Arthur Conrad, associate administrator of the National Physicians' Committee Public Relations for Auxiliaries, Mr William Doscher assistant director of public relations of the American Medical Association and 'Life Expectancy Frank G Dickinson, Ph.D from the Bureau of Medical Economics Research of the A M A

At the luncheon, Mrs Kice introduced Dr R. L. Sensenich A M.A. president, who urged the entire Auxiliary membership to be informed and fearless in talking to other groups about health problems. Dr Louis H Bauer secretary of the World Medical Association, spoke about the organization its formation its aims and purposes

State Auxiliary Program for 1948–1949

PRESENTED at the fall board meeting of the State Woman s Auxiliary in Syracuse on October 18, the year's program for the Auxiliary has been published in a pamphlet 'Ladder to Auxiliary Success' Basing the program on plans to improve public relations, guide legislation stimulate health education support philanthropy, and promote sociability the State Auxiliary will meet February 9 and 10, 1949 In New York City for the midwinter board session In the 36-page program book information is included on archives, calendar convention finance historian *Hygiea* councilors, legislation national health program, national bulletin organization and membership, parliamentarian, Physicians Home press and publicity program public relations, voluntary health prepayment plan and progress reports of State officers and committee chairmen

Westchester Becomes 45th Organized County Auxiliary

WITH the organization of the Woman s Auxiliary to the Westchester County Medical Society on October 27 the number of county auxiliaries in New York State reaches 45 More than 200 wives of Westchester County physicians attended the organization meeting, held in White Plains and became charter members of the new Auxiliary

Mrs. Laurance D Redway, Ossining was elected president of the new group Other officers are Mrs. Reginald A. Higgons, Port Chester president-elect Mrs. Isadore Zadek, Mount Vernon vice-president Mrs. Joseph E. J King Bronxville, recording secretary Mrs David Fertig Hartsdale, corresponding secretary and Mrs Romeo Roberto Yonkers treasurer

At the initial meeting, talks were given by three officers of the State Auxiliary Mrs. Edgar M Neptune, president Mrs. Herman W Galster, vice-president, and Mrs. Morris H. Newton, organization chairman

COUNTY NEWS

Cayuga County

The Cayuga County Woman s Auxiliary held open house and a silver tea at the Cayuga Home for Children in Auburn on November 12, for the benefit of the Home. In charge were Mrs. Herbert Jones chairman of the finance committee, and Mrs F L. Okoniewski chairman of the hospitality committee.

In December the group plans to hold a sale.

Dutchess County

The Dutchess County Woman s Auxiliary met on October 14 in Poughkeepsie, for a luncheon and business session. Guests included Mrs. J Emerson Noll first district councilor and Mrs. W A. Schmitz, State press and publicity chairman Mrs. Noll spoke on the value of woman s auxiliaries and emphasized their worth to the community

The program also included a book review William H Conger of 'I Love My Doctor,'

on the State convention by Mrs Clifford A Crispell and Mrs A W Thompson, and a talk by Miss C R Cortopassi of Vassar Brothers Hospital, who explained how the Auxiliary could aid in transportation of patients for the Cancer Society

Mrs Albert A Rosenberg, president, presided at the meeting

Erie County

A Christmas tea to welcome new members was held by the Erie County Woman's Auxiliary on December 14, with a large Christmas tree and gifts for each guest of honor featuring the decorations A musical program was presented In charge were Mrs Joseph A Zavisca, membership chairman, and Mrs Charles A. Schuder, house and hospitality chairman

Other recent activities of the group include a dessert bridge and fur style show on October 28 for the benefit of the nurses' scholarship fund, with Mrs Norman F Graser, program chairman, in charge, a November luncheon with a harvest theme, and a class in parliamentary law procedure for board members, which began on October 20

Kings County

At the November meeting of the Kings County Auxiliary, held November 9 following a buffet luncheon, Mr Thomas E Walsh, field representative from the Public Relations Bureau of the State Medical Society, was the guest speaker

The annual bridge of the Auxiliary was held on October 26, with Mrs Charles E Robinson as chairman The Auxiliary was represented at the fall board meeting in Syracuse by Mrs Edwin A Griffin, Mrs Clifton L Dance, and Mrs Charles E Scofield, president

Onondaga County

Mr Thomas E Connolly, recently appointed executive secretary of the Onondaga County Health Association, addressed the members of the Onondaga County Auxiliary at their meeting held November 9 in Syracuse His topic was "The Function of the Onondaga Health Association" Mrs William J Ryan was chairman of the social hour which followed Mr Connolly's talk

Queens County

Installation of officers for the Queens County Auxiliary was held December 7 at the Gramercy Park Hotel, with Mrs Meyerson Coe as installation officer Guest speakers were Mrs Edgar M Neptune, State auxiliary president, Mrs Luther H Rice, national auxiliary president, and Mrs Clifton L Dance, second district councilor

Officers installed included Mrs Samuel Klein, president, Mrs Frank Lo Presto, president-elect, Mrs Evan McClave, vice-president, Mrs John De Hoff, secretary, Mrs John Finnegan, treasurer, Mrs William Flanagan, assistant treasurer, Mrs Harry Secky, historian, and Mrs Patric De Cano, Mrs Gustin Kiffney, Mrs John Mauro, Mrs Harold Forster, Mrs John Scannell, Mrs Joseph Hallinan, Miss Adele Hallinan, and Mrs William C Bronx, district representatives

Rensselaer County

The annual membership tea of the Rensselaer County Auxiliary was held October 26 in Troy Guests of honor included Mrs Albert Vander Veer, third district councilor, and Mrs A M Yenich, president of the Albany County Auxiliary

The quarterly bulletin of the Rensselaer County Auxiliary, *The Marc*, celebrated its first year of publication in October Heading the editorial committee are Mrs Samuel Werlin, Troy, and Mrs. John J Noonan, Watervliet

Richmond County

Projects for the year were discussed at the meeting of the Richmond County Auxiliary, held November 16 at the Richmond Memorial Hospital, with the program in charge of Mrs Lawrence Viola

The first meeting of the year was held September 21 at the Staten Island Hospital, with Mrs Joseph Worthen presiding Standing committees were appointed, and the members agreed to continue work in the offices of the Staten Island Tuberculosis and Health Association and of the Staten Island Cancer Committee

Schenectady County

The Schenectady County Auxiliary held its first meeting of the season October 26 at the Mohawk Golf Club, Schenectady, with 56 members present at the luncheon session Dr Nelson Rust, president of the Schenectady County Medical Society, addressed the group

Presiding at the meeting was Mrs Gomer Richards, president Committee reports were given, and the group voted to raise funds for a nurses' scholarship

On November 11, Dr Louis H Bauer, secretary of the World Medical Association, addressed a joint dinner meeting of the Auxiliary and the Schenectady County Medical Society, at the Hotel Van Curler in Schenectady

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THE LADY OR THE TIGER?

A Londoner, not feeling very well, went for free medical care under the new Health Scheme Entering the clinic, he saw an arrow which pointed down a long corridor He followed it until he came to two doors, one marked "Female," the other "Male" Going through the latter he found himself in another long corridor at the end of which were two more doors These were marked "Under 35" and "Over 35" He chose the right one which opened into still another lengthy corridor, which again ended with two doors These were marked "Conservative" and "Labor" As a Conservative, he chose the former, walked through it, and found himself—in the street—*New York Times, November 14, 1948*

ABSTRACT OF MINUTES OF THE COUNCIL OF THE MEDICAL SOCIETY OF THE STATE OF NEW YORK

AT ITS meeting on October 14, 1948 the Council *considered the following matters* taking action as indicated

Secretary's Report

Remission of State Assessments—Remission of State assessments was voted on account of service with the armed forces for one member for 1947 also on account of illness for Julia R. Gibson for 1947 and 1948 Joseph Tennenbaum for 1948 Sidney H Saffer for 1948 and Alexander A Stone for 1948 all of Kings County Doctors William J Roswig and Henrietta C Christen had their War Memorial assessments remitted due to illness

Meetings—Since our last meeting your Secretary attended six district branch meetings. At the meeting of the Fourth District Branch, Saratoga Springs September 24, I addressed the meeting on Paging the Medical Society of the State of New York.'

Your Secretary also attended the funeral of our trustee, Dr Albert A Gartner at Buffalo on September 11 A letter of condolence was sent to Mrs. Gartner as directed by you

Your Secretary attended the dinner of the 34th annual convention of the International Association of Industrial Accident Boards and Commissions at the Hotel Commodore New York City September 14 Present also were Dr Fenwick Beekman, Dr Edward R. Cunniffe, Dr Harry Golombe Dr Chas Gordon Heyd Dr David J Kaliski, Dr J Stanley Kenney, Dr John J Masterson and Mr Thomas E. Walsh Dr Joseph Raphael member of the Medical Practice Committee of the New York State Workmen's Compensation Bureau sat at table with us.

The trustees of the Medical Society of the State of New York have directed me to notify the Council of the necessity for all bureaus, committees and individuals connected with the Society to keep within the 1948 budget owing to the financial condition of the Society

On his way to the Seventh District Branch Meeting at Canandaigua, your Secretary inspected the physiotherapy department at Ithaca College

Your Secretary takes the liberty to suggest that the Board of Trustees be requested to renew Dr Robert R. Hannon's, Dr David J Kaliski's and Mr George P Farrell's contracts with the Society

The New York State branch of Selective Service sent a request to our Society for nominations for appointments to certain local Selective Service Boards Your Secretary has written to the secretaries of the appropriate county medical societies requesting nominations He respectfully requests approval of this action including transmission of such nominations to the Albany office of Selective Service

Communications—1 Letter from Dr Irving L. Ershler secretary of Onondaga County Medical Society, to Dr Anderton September 30 1948 which in part states

> This Society has received a contribution of $24 from St. Joseph Hospital Syracuse, for th proposed War M morial established by the State Society At its regular meeting this week, our Comitia Minora directed me to find out from you if this spontaneous contribution in the name of St. Joseph Hospital will be acceptable.

Dr Anderton stated he had inquired of Counsel whether there was any reason why the Society should not accept money for this purpose and he stated there was not

A vote of thanks was extended in the name of the Society to St Joseph Hospital Syracuse for its donation to the War Memorial Fund

2 Annual letter from the president of the Physician's Home Dr Chas Gordon Heyd requesting the Council to nominate 20 candidates for the Board of Directors of the Physician's Home

It was voted that the Council nominate to the Board of Directors of Physician's Home the following Max Einhorn B Wallace Hamilton Chas Gordon Heyd Beverly Chew Smith George T Strodl Seymour Wimpfheimer J Miller Walker O Shepard Krech Edwin P Maynard Jr Frederic W Holcomb Maynard C Wheeler Everett C Jessup Scott Lord Smith Denver M Vickers, Edward T Wentworth, Douglas Quick, W Guernsey Frey Jr Louis H Bauer Conrad Berens and Herbert H Banckus

3 Letter from Miss Clara Quereau, secretary of the Board of Examiners of Nurses of the Department of Education of the State of New York to Dr Anderton, September 27 1948

> Under the provisions of the Nurse Practice Act of th Education Law, two or more nominations f r a vacancy on the Nurse Advisory Council to be filled by a representative of the Medical Society of the State of New York shall be submitted to the Department on or before November 1 of any year by the Medical Society
>
> The term of Dr Clayton W Greene, Buffalo as a m ber of the Council expires December 31 of this year Advisory Council members are appointed for a term of three years If the Medical Society wishes to recommend the renomination of Dr Greene, it will not be necessary to ubmit his biography since this is already on file. How ever a biographical sketch should be included for the alternate nominee.

After discussion, *it was voted* that the Council of the Medical Society of the State of New York nominate to the Board of Regents of the University of the State of New York Dr Clayton W Greene of Buffalo and Dr W Guernsey Frey Jr of New York for membership on the Nurse Advisory Council

4 Letter from Mrs. Edna C Gartner October 11 1948 expressing appreciation for the Society's condolences was read.

5 Letter from the Deputy Commissioner of Health of the State of New York Dr Hollis S. Ingraham dated September 30 1948 addressed to Dr Simpson

> At Dr Hilleboe's suggestion I am writing to you in regard to rearranging of Medical Society districts, about which he spoke to you by teleph ne recently
>
> The districting of our own Health Department has recently been rearranged so as to incorporate six regions, each under the head of a regional director The attached map indicates the boundaries of these regions.
>
> The delineation of these regions was based on several considerati ns the most important f which was the desire of the Department to maintain close contact with the teaching hospitals and medical schools of the State This is particularly important in relation to the administration of the medical services of the Department. Consideration was also given to the natural flow of the population with regard to distance and transportation facilities, and the Department was guided in this matter by the Marketing Map of New York as prepared by the Hearst Magazines Inc. and to the existing movement of the population with

respect to medical services based on the place of hospitalization of cancer patients

It is also to be noted that the New York State Commission on Medical Care suggested similar districts and primary centers for hospital service, as did the New York State Health Preparedness Commission Also the districts of the New York State Department of Social Welfare follow this same outline Each of the above varies only by the inclusion or exclusion of a few counties

In general we believe that the regionalization as depicted here will prove to be of continuing value to our Department and from our point of view the redistricting of the State Medical Society along the same lines would prove definitely helpful to us in our various joint endeavors There are, of course a number of aspects of the matter from the point of view of the Medical Society which we are in no position to evaluate and we are merely suggesting that since redistricting is now being considered, this general outline be brought under discussion

If you deem it desirable and Dr Kenney concurs I should be very happy to meet with the Committee and present more details regarding this proposal

It was voted that this be referred to the Planning Committee for Medical Policies

6 Letter from Dr Simon Strauss, retired member, requesting that he be recommended for Associate Fellowship in the American Medical Association

It was voted that he be so recommended

Secretary's report was accepted, and its recommendations were voted

Treasurer's Report was accepted

Report of Executive Officer

Dr Hannon reported verbally as follows

The Executive Officer has attended district branch meetings, which have all been completed but two, which will be held during the next two weeks

The office in Albany has been busy preparing for the legislative session of next year Many different bills have been proposed

One of the suggested bills to come before the next Legislature is from the Board of Regents in regard to rescinding or amending the Education Law, Chapter 211 I think it is, that pertains to the endorsement of licenses or the granting of a license without examination This suggestion has come from them, I think, because of the difficulties they have had along that line in the past

I have been instructed to attend a meeting tomorrow afternoon in Albany regarding proposed legislation for enforcing the inclusion of iodine in table salt I have been collecting opinions on that, and so far the consensus of opinion seems to be that it would be unwise to make it compulsory to add iodine to all salt sold in New York State If there are any expressions otherwise from members of the Council, I would appreciate having them before tomorrow

I have been having correspondence with Senator Desmond on the proposed amendment to the law requiring premarital health certificates We have been instructed by the House of Delegates to advocate a bill shortening the time

We are working on many proposed bills, and I would appreciate very much if anyone that has material or suggestions regarding these proposed legislative matters would send them to my office as early as possible

Activities of Committees

Economics —Mr Farrell, director of the Bureau of Medical Care Insurance, made the following report

During September, Mr Farrell attended the Fifth, Sixth, Seventh, and Eighth District Branch meetings and, at the Sixth District meeting in Binghamton, served as moderator at a round-table discussion on Prepayment Medical Care Papers were presented by Dr Wertz, Dr Leo Gibson, and Dr John F Kelley on why doctor participation is necessary for the success of a medical care plan, how the Central New York Medical Plan serves the doctor and the public, and why Medical and Surgical Care of Utica has the largest member participation of any plan in the State in relation to Blue Cross subscribers

September 21 Mr Farrell was present at a stated meeting of the Medical Society of the County of Westchester in White Plains A discussion of United Medical Service was presented by Mr John McCormack, executive vice-president, Dr F E Elliott, medical director, and Mr Fred Newell, enrollment supervisor of the plan

September 23 Mr Farrell attended a meeting at the Waldorf-Astoria for the discussion of proposals for a Blue Cross-Blue Shield Association and Blue Cross-Blue Shield Health Service, Inc , called by the director of the Hospital Service Plan Commission and the director of Associated Medical Care Plans, for districts II and III, representing the states of New York and New Jersey Dr Paul R Hawley, chief executive officer of Blue Cross-Blue Shield Commission, explained the proposals Following the meeting Mr Farrell summarized these proposals, with comments, for distribution to New York State plan presidents

Summary and Comments

PROPOSALS FOR A BLUE CROSS-BLUE SHIELD ASSOCIATION AND BLUE CROSS-BLUE SHIELD HEALTH SERVICE, INC

The proposals have been approved by the Joint Commission of Blue Cross and Blue Shield and by each Commission separately

They have been accepted by American Hospital Association and Board of Trustees of American Hospital Association

Proposals will be discussed and voted upon at the Annual Conference of plans in French Lick Springs, Indiana, October 25 to 28, 1948

The purpose of proposed Blue Cross-Blue Shield Association is to supplement the activities of both Commissions, to establish a national agency "to provide protection against the cost of health service for employes of employers operating in a territory or territories not fully covered by a single plan," and to act as the agent of each plan in soliciting the employes residing in the territory served by such plan as subscribers to each plan's subscription certificates and in collecting the subscription rates payable thereunder, to provide protection against the cost of such health service as is not included in the benefits offered by the plan otherwise serving such employes, and provide protection against the cost of health service to employes residing in any territory not served by a plan The agency shall not in any event offer or provide to any such employes protection against the cost of any health service which is included in the benefits which a plan is willing to provide

Membership —Each person who is a member of the Blue Shield and Blue Cross Commissions automatically becomes a member of the corporation A bicameral system of voting applies on all questions except in the election of governors

A board of governors shall manage the affairs

of the corporation There shall be 30 in number 15 Hospital Governors and 15 Medical Governors of which three are representatives of the American Hospital Association and three are representatives of the American Medical Association

A majority of the members of the board of governors shall constitute a quorum for the transaction of business and majority vote shall be the act of the board and not the bicameral system of voting

It is proposed to establish a Blue Cross-Blue Shield Health Service Inc. which will be a stock insurance company

The amount of capital of the company shall be $333 100 represented by 3,430 shares divided into two classes, namely 3 330 preferred shares of the par value of $100 per share and 100 common shares of the par of $1 00 per share. Preferred shares shall be issued at $150 per share of which $100 per share shall be allocated to capital and $50 per share shall be allocated to paid in surplus Common shares shall be issued at $5 00 per share of which $1 00 per share shall be allocated to capital and $4 00 per share shall be allocated to paid in surplus

It is contemplated that preferred shares will be purchased at $150 per share with funds to be furnished by contributing plans If all shares are so purchased, the corporation will have a capital and paid in surplus of $500 000 The preferred shares shall not be entitled to any dividends and all net earnings will be used to redeem the preferred shares at their issue price In order that contributing plans can act together it is also intended that the preferred shares will be placed in a voting trust under which the trustee will vote only as directed by the contributing plans. By the terms of the voting trust agreement, the trustee is to elect ten of the fifteen directors

The common shares will be purchased and held by the Association Until the contributed capital has been returned by the redemption of the preferred shares the Association will elect five of the fifteen directors. Thereafter the Association will completely control the Health Service Inc. through the ownership of all outstanding shares and will be entitled to receive all earnings

The corporation has been organized and shall be operated solely for the purpose of supplementing medical care and hospital care benefits which voluntary nonprofit hospital or medical care plans may from time to time be willing to provide and to assist plans in serving the employes of employers operating in a territory or territories not fully covered by a single plan In serving these employes, this corporation shall to the extent permitted by law use its best efforts to induce the employes residing in a territory served by a plan to become subscribers to the subscription certificates issued by such plan and to assist such plan in collecting the subscription rates payable thereunder provide protection in the form of indemnity or otherwise against the cost of such hospital, medical, or other health care as is not included in the benefits offered by the plan otherwise serving such employes provide protection in the form of indemnity or otherwise against the cost of hospital medical, or other health care to employes residing in any territory not served by a plan This corporation shall not in any event offer or provide to any person protection against the cost of any health service which is included in the benefits which a plan is willing to provide to such person The protection so provided by this corporation to persons residing in a territory otherwise served by a plan shall to the extent legally permissible be administered by such plan and to that end this corporation shall, where legally permissible appoint each plan or its chief salaried executive officer as its only agent or agents in said territory

Comments—Under the Blue Cross Blue Shield Health Service Inc, there would be one corporation which would provide excess coverage for employes who are members in local plans for both hospital and medical care

Under this arrangement, overutilization for hospital benefits would be made up from premium income received for the excess coverage providing medical care benefits Conversely, the same would apply for overutilization in medical care benefits.

The one corporation idea is contrary to the method and principles of the present hospital and medical care plans now operating in New York State, which retain within their own control the rights and privileges to make changes in contract benefits policies rates etc

Due to the steadily increasing rise in hospital costs and the possibility that subsidies may have to be obtained to meet these costs either by local taxation or grants from the State or Federal government, it is advisable to establish two corporations namely one hospital and one medical in order that the medical plan would be entirely independent of any dictation from a State or Federal level regarding its policies. Also the medical profession would be in control of the establishment of fee schedules which would apply to the excess coverage offered.

Under the proposed Health Service Inc. benefits could be offered only on an indemnity basis. However if through negotiations with a national account service benefits were demanded it would then be entirely up to the willingness of local physicians to accept the indemnity schedule in full payment for their services.

It is perhaps difficult to determine what excess coverage national accounts would demand through bargaining agreement with unions In the event a complete medical care program is negotiated excess coverage would be administered by the local plan in addition to its established benefits. From an administrative point of view, it would be reasonable to anticipate that where house and office calls are provided administrative functions in claims would increase many times as compared to the incident of demand under the local plan This would automatically increase the administrative costs of each plan unless they are reimbursed by the Health Service, Inc., for these services.

The principle and purpose upon which medical care plans were organized were for community service organizations Would not a plan be criticized for discriminating against subscribers who were not employes of national accounts by offering to a preferred group excess benefits which would not be available to local subscribers?

In order to establish the Health Service Inc, it is necessary for the plans to contribute $500 000 and, being nonprofit corporations subject to the New York State Insurance Department regulations I believe that before a commitment could be made, a definite ruling regarding a contribution for the purchase of stock should be obtained from the Commissioner of Insurance.

Dr Wertz chairman, stated that there would be a meeting the same afternoon of the Subcommittee on Medical Expense Insurance at which the proposal of the Blue Cross-Blue Shield Association and the Blue Cross-Blue Shield Health Service Inc would be discussed.

Because of the statement from the Council on Medical Service of the American Medical Association, he recommended that the Council of the State Society recommend to our Subcommittee to go on record not to do anything in regard to this until the House of Delegates of the American Medical Association has taken action on these proposals He thought it very important the Council take such action today because the matter is coming up at French Lick on the 25th of this month

After discussion, *it was voted* that the Council second the report of the Council on Medical Service of the American Medical Association and that they oppose the formation of a national health insurance company under the auspices or direction of Blue Cross-Blue Shield and that the Subcommittee on Medical Expense Insurance be so informed and given power to notify all of the medical plans in New York State to that effect

Dr Wertz brought up the matter of the medical services being promoted by Blue Cross contracts and which may be enlarged In a recent opinion of Attorney-General N Goldstein, he states that in his opinion the Blue Cross, that is, the hospital service people, can provide medical services, such as x-ray, anesthesia, physical therapy, and pathology and include them in their contracts Dr Wertz thought this ruling would have a very serious effect on the practice of medicine in the State of New York He had consulted with Judge Piper who was the head of a committee which rewrote the insurance law and was told that he did not agree with Attorney-General Goldstein's opinion

Dr Masterson stated that the Joint Council of Radiologists, Pathologists, Anesthesiologists, and Physical Therapy physicians carried this matter originally to the State Insurance Department They hired Mr Sherpick, a member of the Bar, and he understood that they intend to appeal this decision in the courts If they do, he thought the State Society should cooperate with them

After discussion, *it was voted* to refer this matter to the Planning Committee for Medical Policies for study and report

Finance Committee—Dr Andresen, chairman, presented the tentative budget for 1949, with detailed explanations

It was voted that the budget be adopted and referred to the Board of Trustees for their approval

Malpractice Insurance and Defense Board.—Dr Jonas Borak was granted the privilege of appearing before the Council to ask for a revision of the decision of the Malpractice Insurance and Defense Board not to grant him malpractice defense insurance

Dr Borak presented his case, and Dr D'Angelo spoke on behalf of the Malpractice Insurance and Defense Board

After discussion, *it was voted* to refer the matter back to the Malpractice Insurance and Defense Board for further consideration with the suggestion that Dr Borak appear before the Special Advisory Radiology Subcommittee

Dr Leo F Schiff, chairman, sent the following report under date of October 6, 1948, which was read by Dr Anderton

Acknowledgment is made of receipt of a letter from Dr Anderton referring back to this Board for 'clarification and more specific recommendations" the recommendation previously made by this Board, will not occur until October 20, and the matter was felt to be of sufficient importance to warrant presenting it to the Council at the meeting of October 14, a telephone referendum of the Board was carried out, the results of which are herewith recorded

The Board is in unanimous agreement on the following points

1 The Alameda County Plan has apparently achieved considerable success in reducing the number and cost of malpractice actions principally through the activation of a realistic program of public relations The term "public relations" is here used in a sense differing considerably from the concept of "public relations" as carried out by State and county society committees in this State It attempts to reach the public, not so much through committee-sponsored publicity as it does through encouraging the individual physician to promote better patient-physician relationship, to observe more rigidly the principles of medical ethics, and to reduce to a minimum all cause for dissatisfaction and complaint by patients It has, for example, induced the physicians in several communities to formulate programs whereby patients in need of medical attendance in emergencies, and particularly at night, do not have to telephone through a long list of physicians before they receive attention Local grievance committees have ironed out many difficulties and forestalled legal actions It is obvious that any attempt to carry out a similar plan in this State would require careful study and would involve considerable revamping of our present public relations program

2 Time is an important factor At the present we are faced with an acceleration of the upward trend of malpractice suits and claims in this State

3 A study of the plan through correspondence at long range would be time-consuming, and not nearly so efficient as an on-the-spot study by representatives of this Society For these reasons your Board again recommends that a committee be authorized to visit Alameda and neighboring counties in California for the purpose of securing full information as to the scope, method of operation, and success of the plan, together with the reaction of members of the Medical Society and others in that section We feel that such a study will be much more fruitful if carried out by a committee representing the various activities involved rather than by one individual, and recommend that such a committee be composed of

(*a*) The Secretary of this Board because of his technical knowledge of the insurance situation

(*b*) A medical member of this Board who can study the plan from the doctor's point of view, yet with some special knowledge of the malpractice situation

(*c*) A member of the State Society to represent Public Relations in the sense hereinabove given to the term

(*d*) The legal counsel of this Society, or his representative, to study the situation from a legal point of view, since the laws of California and their application to malpractice may have some important bearing on the situation in that state

4 We estimate that the study can be completed within a week Therefore, a proposed budget for such a committee would include the travel expense to California and return and maintenance in California for one week for each member of whatever committee may be so appointed

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[Continued from page 2748]

taken at all, it should be done thoroughly and promptly and that the advantages, financial and professional, to be gained from such a program if it can be successfully applied in this State warrant the expenditure suggested We again point out the urgency in consideration of this matter and request that any action taken by the Council at the meeting of October 14 requiring any further consideration by this Board be communicated to the secretary of this Board in time for presentation at the meeting which will be held on October 20

After discussion, *it was voted* that the report be approved with the amendment that two members only, the Secretary and one medical member, be authorized to go to California instead of four

After discussion, *it was voted* that the Council recommend to the Board of Trustees a special appropriation not to exceed $1,500 to defray the expenses of two members of the Malpractice Insurance and Defense Board to visit the Alameda County Medical Society (California) to study methods of reducing incidence of malpractice insurance defense cases

Medical Service —Dr Wertz reported that letters were being sent to constituent county societies requesting nominees for the outstanding general practitioner of the year, the selection to be made at the Interim Session of the American Medical Association He requested advice as to what method to use in choosing a nominee from New York State

It was voted that the Medical Service Committee screen county society recommendations and submit three nominees to the Council next month, with their records and credentials

It was voted that the Council would then select one candidate to be submitted to the trustees of the American Medical Association

Planning Committee for Medical Policies —Dr Kenney, chairman, reported progress

Public Health and Education

The report as distributed with the agenda is as follows

Activities of the Chairman

September 15 In Pomona, New York, to attend the meeting of the Council Committee on Public Health and Education and the Subcommittee on Geriatrics

October 13 In New York City attended a meeting of the Council Committee on Public Health and Education and the Subcommittee on Cancer Also present at this meeting were some of the officers of the Medical Society of the State of New York and representatives of the New York State Department of Health A verbal report of this meeting will be made to the Council by the Committee chairman

Subcommittee on Geriatrics —The following report was submitted by Stephen R Monteith, chairman

A meeting of the Subcommittee on Geriatrics was held at Summit Park Sanitorium, Pomona, on Wednesday, September 15, 1948 Present were Drs Scott Lord Smith, C Ward Crampton, Stephen R. Monteith, and O W H Mitchell

Review was made of the Committee's report to the House of Delegates and it was considered proper at this time to formulate plans and urge legislation concerning some of the matters recommended in the report, if such plans meet with the approval of the Council

Nursing Homes —The Committee feels, in the matter of care of the chronically ill, that what progress as is possible at present is being made in developing hospital facilities for the chronically ill At least stimulation to concerted effort in this direction appears to be developing

In order to fulfill requirements at the nursing home level your committee feels that the very first step should be the enactment of legislation embodying the licensing of nursing homes and standardization of their construction, equipment, and staffing

Practical Nursing —In close relationship with development of nursing homes and the recent idea of supplying nursing service in the home under hospital direction is the shortage of help, both nursing and technical

Your Study Committee feels that possibly legislation stimulating or subsidizing training programs in the fields just mentioned might be helpful in eventual solution of the personnel problems involved, particularly in the practical nurse training programs now developing in the Department of Education

Medical Research Council —Your Study Committee feels strongly that research in various chronic diseases should be one of the prime objectives of all medical schools and of the appropriate research bureaus of the Department of Health of the State of New York We believe that such research will, of necessity, be of varied kinds, and many projects will be of long duration The creation of a Medical Research Council to coordinate and subsidize these various projects would seem to lead to economy both of effort and of funds Your Committee would recommend introduction of legislation, if needed, to create such a council

Health Record —For the reasons set forth in its former report, the Subcommittee on Geriatrics believes the continuing Health Record could make a valuable contribution to the eventual solution of some of the problems of geriatric medicine Therefore, we should like to urge study of such a scheme by the Department of Health and the Division of Vital Statistics

Subcommittee on Blood Banks —Lester J Unger, chairman, reported as follows

A meeting of the Council Committee on Public Health and Education and the Subcommittee on Blood Banks was held in New York City on September 16, 1948 Also present at this meeting were some of the officers of the Medical Society of the State of New York and representatives of the State Department of Health and the American Red Cross A report of this meeting was made at the Council meeting by your chairman

Postgraduate Instruction —Postgraduate instruction has been completed in the following counties Allegany, Cayuga, Otsego, and Steuben

Since the September report of the Council Committee on Public Health and Education, the committee has arranged for postgraduate instruction for the following counties Columbia, Fulton, Jefferson, Ontario, St Lawrence, Schenectady, Suffolk, and Ulster

Postgraduate instruction is being planned in the following counties Monroe, Onondaga, Orange, Richmond, Schoharie, Sullivan, and Tompkins

Requests for instruction have been received from the Clinton County Medical Society and the Glens Falls Academy of Medicine These arrangements are incomplete

The material for the 1948-1949 Course Outline Book has been sent to the printer and we hope to have it ready for mailing within three or four weeks

Cancer —Dr Mitchell stated that their committee was contemplating preparation of a Cancer

[Continued on page 2752]

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[Continued from page 2750]

Manual of about 160 to 200 pages It would be issued in the name of the Medical Society of the State of New York and the New York State Department of Health, and it is contemplated that the State Department of Health would bear the cost of distribution to all doctors in the State Details are being perfected and will be reported later

Medical Moving Picture Review Board—Dr Mitchell stated that the new Course Outline Book will carry announcements that the American Medical Association and the New York State Department of Health have medical moving pictures available for teaching purposes without cost to medical societies As there are many films, Dr Mitchell requested that a review board be appointed to select ones best adapted for postgraduate education in our Society

After discussion, *it was voted* that a Motion Picture Review Board be appointed by the President, when, as, and if necessary

Diabetes—Dr Mitchell stated that he had received considerable literature dealing with increasing activities for the detection of diabetes It is roughly estimated there are about 1,000,000 diabetics in the United States of America who are known and perhaps the same number not known The American Diabetes Association is proposing a public drive for the detection of diabetes Dr Mitchell stated that we are in sympathy with and approve in principle such a plan, but its actual operation should be left to the individual county societies

It was voted that the American Diabetes Association be informed that the Medical Society of the State of New York is sympathetic with and approves the detection plan in principle but that the actual operation of it should be adjusted with the individual county medical societies

Public Relations—Dr Winslow, chairman, submitted the following report

The major portion of the Public Relations Bureau's activities during the last month were concerned with district branch meetings Advance releases were sent to the daily papers and wire services in the various districts together with excerpts of the addresses made by Dr Leo F Simpson, president, and Dr John J Masterson, president-elect Mr Anderson attended each of the district branch meetings held to date Mr Miebach attended the meetings of the Fifth, Sixth, Seventh and Eighth District Branches Mr Walsh attended those of the Third and Fourth Districts and will attend the Second and First District Branch Meetings

Clippings from the State press received by the Public Relations Bureau show that the district branch meetings were well publicized in advance and that they also received excellent follow-up stories in the cities where the meetings were held

On September 2, Mr William F Doscher, assistant public relations director of the American Medical Association, visited the Public Relations Bureau for the purpose of becoming acquainted with the activities of the New York Society His visit furnished an opportunity to discuss various ways in which the public relations activities of the State Society and those of the American Medical Association might be more closely coordinated.

On September 21, the Public Relations Bureau issued a news release on behalf of the Bureau of Medical Care Insurance setting forth the growth of the six voluntary nonprofit medical care plans in New York State during the first half of 1948

The following postgraduate sessions held under the auspices of the Committee on Public Health and Education were covered by releases to the press Allegany, Fulton, Orange, and Otsego

Letters were prepared for the president of Veterans Medical Care Plan and sent to the New York State commanders of all veterans' organizations Among the replies received was one stating that the commander thoroughly endorses the Society's efforts in behalf of veterans suffering from service-connected disabilities Conferences were held with Dr O'Kane, the coordinator, and Dr Crane and Dr Pettit of Richmond County on the content of the resolution passed by the Richmond County Department of the American Legion These conferences resulted in the appointment by the president of the Richmond County Society of a committee to meet with the veterans' organizations in that county as a preliminary to having these service organizations call upon the Veterans Administration to appoint a coordinator on Staten Island so that the hardship encountered by veterans traveling back and forth from the Veterans Administration Clinic in New York may be eliminated

On an invitation from the president of the Woman's Auxiliary, Mr Walsh spoke at a meeting of the Executive Board and at the Auxiliary's Third and Fourth District Meetings He also assisted the senior counselor and the State chairmen of the program, public relations, legislative, press and and publicity, and the fact-finding committees in the preparation and distribution of their 1948 programs

A 23-page draft of a proposed manual for county legislative chairmen and committee members has been prepared and submitted to the Executive Officer for review This manual explains the functions of the county legislative committees and how they can best cooperate with the State Society

Veterans Administration, Liaison with the—Dr Bauckus, chairman, reported verbally as follows

Thank you, Mr President, and members of the Council, for inviting me to report at this meeting I have not reported to you since June, although you have had discussion on this subject at the House of Delegates' meeting I just have a very few statistics I think you should hear in order to improve acquaintance with the situation This is from the Office Report of the Department of Medicine and Surgery, Branch 2, Veterans Administration, Report of Progress, July, 1947–June, 1948

Where VA clinics were not feasibly available, outpatient care of eligible veterans was performed under the Home Town Medical Care Plan During fiscal year 1948, 98,609 veterans were treated by private physicians under this plan, at a cost of $2,582,761 to the VA About 59 per cent of all VA outpatient medical care in the State was performed by non-VA physicians

Under a similar arrangement with private dentists, 95 per cent of all dental care rendered during the year was performed by non-VA dentists, 94,238 treatments and 64,279 examinations were authorized to fee basis dentists and were completed at a cost of $7,688,016 to the VA.

There is one other item, to give you an idea of what is being spent in New York State

During the fiscal year, a little less than $50,000,000 was spent in New York State directly or indirectly for providing medical care for veterans This figure represents about eight per cent of total expenditures by the VA in New York State,

[Continued on page 2754]



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[Continued from page 2752]

which amounted to about $600,000,000 for the fiscal year These figures are exclusive of the cost of new hospital construction, which are not included in the branch budget

I would like to comment on the reason that I think the expenditures for dental care are much higher than for medical care, and, by the way, the total amount of money for dentists was $7,688,016 compared to $2,582,761 for medical care under our Home Town Care Plan I think that most of the care being done privately by dentists was due to the fact that the VA had difficulty in employing dentists on a full-time or part-time basis as well as difficulty in getting equipment for them, but it was comparatively easy for them to employ part-time and full-time physicians

While I am on that subject, our troubles have not been with the full-time physician but have been with the part-time physician whom they can very easily get

In the hospitals, reference is made to the high quality of care and I assume it is so They use this argument that the Deans' Committee have much to say about the staffs of hospitals and what they have done, therefore, everything is fine Some men have accepted positions because in the hospitals they are now able to get credit for their national specialty boards and some of these men say they have gone into the service because they could not get such credit rating in any other way It seems to me that part of the Hippocratic oath relating to teaching applied first In that oath is comprehended the fact that some men are very anxious to get into some veterans' hospital in some capacity because the Deans' Committee has something to do with it

Under date of October 9 in the *Journal of the American Medical Association* there is a little item which I think you should hear

NONSERVICE-CONNECTED DISABILITIES

In a summary of its activities as of August 31, 1948 the Veterans Administration reported a total of 105,048 patients in hospitals of the 92 983 in veterans administration hospitals 61 091 were veterans with nonservice-connected disabilities, of the 12 065 patients not in veterans administration hospitals 7 488 were veterans with nonservice-connected disabilities In addition there were 14 342 beneficiaries in Veterans Administration homes

Eighty-nine new hospitals were in progress at the end of August of which the construction contracts had been awarded for 28 the designs were in progress in 50 the designs not started in three and the designs completed but construction contracts not awarded in eight Through the end of the month, 63 sites have been acquired for new veterans hospitals, 20 specific sites have been approved but not acquired seven specific sites were in the process of selection furthermore 31 additions and conversions to the hospital addition and conversion program had been completed throughout the month, and 17 other additions and conversions were in progress

At the end of August, 18 560 veterans were awaiting hospital admission of these 18 490 had disabilities adjudicated nonservice-connected, 77,277 applications for hospital or domiciliary care were received through the month and 33 679 applications were filed for automobiles for disabled veterans.

That should illustrate to you the huge program that may be anticipated for the future in these hospitals, and, as I read to you, a great many of them have not even been designed, to say nothing of beginning them In this matter, by the way, the American Hospital Association is very much with the medical profession in seeking to curb the erection of unnecessary hospitals Now is the time when the Hospital Association seems to be willing to go along with us

There are just two additional items, and then will stop They are quite important, however, and I think may require action by the Council We had a joint meeting yesterday of the Board of Directors of the Veterans Medical Service Plan of New York Inc , and our Liaison Committee with the Veterans Administration We discussed two main items One is the question of the renewal of the contract of Veterans Medical Service Plan of New York Inc , with the Veterans Administration We, as you know, renewed the contract with them which expired June 30, 1948, for three months We had some difficulty about that because the authorities in Washington, although I think in the New York Branch area too, wanted to discontinue the supervision of the State Medical Society by the removal of the coordinators We objected As you know the Veterans Administration furnishes the funds for the State Medical Society to pay these coordinators The expiration date was September 30, 1948

In the middle of September, I met Dr Butler in New York City, where he is the branch director, to discuss the question of contract renewals He proposed that the same contract be continued for another three months There is much uncertainty about future plans of course on account of the election However, he stated also that Mr Gray, the new director of the Veterans Administration, was making a survey and study throughout the country and until that was completed it would not be known what changes they might want Therefore, I wrote to the Board of Directors and secured their written vote to prolong the existing contract again for three months

We ought to have a longer contract than that Yesterday the Board of Directors and Committee advocated a year

If you recall, the House of Delegates stated that any new contract made with the Veterans Administration should ask for or insist upon the free choice of physician and hospital wherever possible, and there was some question as to whether we ought to insist upon a more strict conformation to that principle in a new contract However, after all it depends on what they want to do in the various branches as far as the free choice is concerned, and it seemed that would be possible under the old contract Therefore, we decided yesterday to recommend that we engage in a renewal of the contract for one year, and I think the Liaison Committee and the Board of Directors of the Plan, too, would like to have Council approve that item

The other question relates also to a House of Delegates' mandate that we meet (a committee of the Medical Society of the State of New York) with the representatives of veterans' organizations I think that important meeting will take place soon The President, I hope, can arrange that this committee, chosen by him, which is composed of the Board of Directors of the Veterans Medical Service Plan, and I think the Liaison Committee, should be the committee to meet with representatives of veterans' organizations That should be done this fall

It was voted that in view of the fact that the chairman of the Liaison Committee felt that the renewal of the contract was in accord with the motion of the House of Delegates his action be approved

It was voted that the President arrange that the committees of the Medical Society of the State of New York meet with representatives of veterans organizations as mandated by the House of Delegates some time soon

[Continued on page 2756]

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[Continued from page 2752]

which amounted to about $600,000,000 for the fiscal year These figures are exclusive of the cost of new hospital construction, which are not included in the branch budget

I would like to comment on the reason that I think the expenditures for dental care are much higher than for medical care, and, by the way, the total amount of money for dentists was $7,688,016 compared to $2,582,761 for medical care under our Home Town Care Plan I think that most of the care being done privately by dentists was due to the fact that the VA had difficulty in employing dentists on a full-time or part-time basis as well as difficulty in getting equipment for them, but it was comparatively easy for them to employ part-time and full-time physicians

While I am on that subject, our troubles have not been with the full-time physician but have been with the part-time physician whom they can very easily get

In the hospitals, reference is made to the high quality of care and I assume it is so They use this argument that the Deans' Committee have much to say about the staffs of hospitals and what they have done, therefore, everything is fine Some men have accepted positions because in the hospitals they are now able to get credit for their national specialty boards and some of these men say they have gone into the service because they could not get such credit rating in any other way It seems to me that part of the Hippocratic oath relating to teaching applied first In that oath is comprehended the fact that some men are very anxious to get into some veterans' hospital in some capacity because the Deans' Committee has something to do with it

Under date of October 9 in the *Journal of the American Medical Association* there is a little item which I think you should hear

NONSERVICE-CONNECTED DISABILITIES

In a summary of its activities as of August 31 1948 the Veterans Administration reported a total of 105 048 patients in hospitals of the 92 983 in veterans administration hospitals 61 091 were veterans with nonservice-connected disabilities of the 12 065 patients not in veterans administration hospitals 7 488 were veterans with nonservice-connected disabilities In addition there were 14 342 beneficiaries in Veterans Administration homes

Eighty nine new hospitals were in progress at the end of August of which the construction contracts had been awarded for 28 the designs were in progress in 50 the designs not started in three and the designs completed but construction contracts not awarded in eight Through the end of the month 63 sites have been acquired for new veterans hospitals 20 specific sites have been approved but not acquired seven specific sites were in the process of selection furthermore 31 additions and conversions to the hospital addition and conversion program had been completed throughout the month and 17 other additions and conversions were in progress

At the end of August 18 560 veterans were awaiting hospital admission of these, 18 490 had disabilities adjudicated nonservice-connected 77,277 applications for hospital or domiciliary care were received through the month and 33 679 applications were filed for automobiles for disabled veterans

That should illustrate to you the huge program that may be anticipated for the future in these hospitals, and, as I read to you, a great many of them have not even been designed, to say nothing of beginning them In this matter, by the way, the American Hospital Association is very much with the medical profession in seeking to curb the erection of unnecessary hospitals Now is the time when the Hospital Association seems to be willing to go along with us

There are just two additional items, and then I will stop They are quite important, however, and I think may require action by the Council. We had a joint meeting yesterday of the Board of Directors of the Veterans Medical Service Plan of New York, Inc , and our Liaison Committee with the Veterans Administration We discussed two main items One is the question of the renewal of the contract of Veterans Medical Service Plan of New York, Inc , with the Veterans Administration We, as you know, renewed the contract with them which expired June 30, 1948, for three months We had some difficulty about that because the authorities in Washington, although I think in the New York Branch area too, wanted to discontinue the supervision of the State Medical Society by the removal of the coordinators We objected As you know, the Veterans Administration furnishes the funds for the State Medical Society to pay these coordinators The expiration date was September 30, 1948

In the middle of September, I met Dr Butler in New York City, where he is the branch director, to discuss the question of contract renewals He proposed that the same contract be continued for another three months There is much uncertainty about future plans of course on account of the election However, he stated also that Mr Gray, the new director of the Veterans Administration, was making a survey and study throughout the country, and until that was completed it would not be known what changes they might want Therefore, I wrote to the Board of Directors and secured their written vote to prolong the existing contract again for three months

We ought to have a longer contract than that Yesterday the Board of Directors and Committee advocated a year

If you recall, the House of Delegates stated that any new contract made with the Veterans Administration should ask for or insist upon the free choice of physician and hospital wherever possible, and there was some question as to whether we ought to insist upon a more strict conformation to that principle in a new contract However, after all, it depends on what they want to do in the various branches as far as the free choice is concerned, and it seemed that would be possible under the old contract Therefore, we decided yesterday to recommend that we engage in a renewal of the contract for one year, and I think the Liaison Committee and the Board of Directors of the Plan, too, would like to have Council approve that item

The other question relates also to a House of Delegates' mandate that we meet (a committee of the Medical Society of the State of New York) with the representatives of veterans' organizations I think that important meeting will take place soon The President, I hope, can arrange that this committee, chosen by him, which is composed of the Board of Directors of the Veterans Medical Service Plan, and I think the Liaison Committee, should be the committee to meet with representatives of veterans' organizations That should be done this fall

It was voted that in view of the fact that the chairman of the Liaison Committee felt that the renewal of the contract was in accord with the motion of the House of Delegates his action be approved

It was voted that the President arrange that the committees of the Medical Society of the State of New York meet with representatives of veterans organizations as mandated by the House of Delegates some time soon

[Continued on page 2756]

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[Continued from page 2754]

War Memorial

It was voted that the Council recommend to the Board of Trustees that the expenses for the War Memorial be allocated from the general finances of the Society

Woman's Auxiliary —Dr Beekman, chairman of Advisory Committee, read the following letter written by the Secretary of the American Medical Association to Dr Anderton

September 14, 1948

TO THE SECRETARIES OF THE CONSTITUENT STATE MEDICAL ASSOCIATIONS

For your information as secretary of your constituent state medical association I am transmitting herewith the following resolution on Funds to Defray Expenses of Woman's Auxiliaries of State Medical Associations which was adopted by the House of Delegates of the American Medical Association at its annual session recently held in Chicago This resolution was introduced in the House by a delegate representing the Oregon State Medical Society

WHEREAS our local state and national woman s auxiliaries have become an indispensable adjunct of organized medicine and

WHEREAS the local state and national auxiliaries are especially effective as agencies for furthering the education of the public concerning the aims and accomplishments of scientific medicine and

WHEREAS their maximum effectiveness requires participation by the wife of every member and sufficient funds to enable them to carry on their essential activities therefore be it

Resolved that each constituent state medical association be urged to budget sufficient funds to defray the cost of the activities of its auxiliary and to pay the annual dues of the national auxiliary thus making the wife of every member automatically a member of the state and national auxiliaries and eliminating the collection of state and national auxiliary dues from individual auxiliary members.

Very sincerely yours
George F Lull

Dr Beekman felt if this was done they would no longer be a voluntary organization The Society allows the Woman's Auxiliary an appropriation of $2,000 per year with no strings attached He stated that the Auxiliary was very active Mrs Neptune, the president, has attended all the District Branch meetings to date, the ladies expecting to raise their dues from 75 cents to a dollar a year They have also asked to be supplied with secretarial help and some place to put their filing cabinets

Workmen's Compensation —Dr Kenney, chairman, submitted the following report as distributed with the agenda

New Fee Schedule —Thus far we have received a very large number of inquiries concerning the applicability of certain fees A number of questions have been posed concerning certain items, e g , the fee to be paid to specialists in surgery (S4) for the first treatment The fee schedule calls for a fee of $15 for complete examination or consultation in the office and a subsequent fee of $5 00 for office treatments The question, whether the $15 fee applies to *all* first visits regardless of whether the patient is a referred patient or consultation or just an ordinary patient which the surgeon elects to treat, is a moot one We have conferred with the chairman of the Advisory Committee and with other members of the Committee as to their interpretation of this item and have also written to the chairman of the Workmen's Compensation Board and in her absence have conferred with the secretary of the Board

There seems to be considerable doubt as to whether the $15 fee is to apply for ordinary first treatments In order to clarify this point and other questions which have arisen, we have strongly recommended a hearing by the chairman of the Workmen's Compensation Board at the earliest possible moment so that these doubtful points may be clarified

There are numerous other questions concerning fees which should be considered at the same time We have already drawn to the attention of the secretary of the Board certain errors and omissions in the fee schedule, notably the failure to provide a fee for XE practitioners and the failure to include the complete schedule for multiple x-ray examinations in the new booklet Under the old schedule partial specialists were paid full fees for operative work but lesser fees than full specialists for office and other calls or visits This should apply to the new schedule

One very important question which has arisen is whether a patient injured before September 1, but not treated until September 1 or after, calls for a fee under the new schedule or under the old one It seems the consensus of opinion, not officially verified, that the new schedule would apply in all cases not treated until September 1 or subsequently, even though the injury was sustained before September 1 This is the equivalent of the old cases reopened after September 1 where the case is not treated until or subsequent to September 1 One of the lay members of the Committee expressed the opinion that the new fees were to apply even were the patient treated by a general practitioner prior to September 1 and then referred for specialistic care or surgery after September 1 Inasmuch as the schedule calls for a fee of $5 00 for all subsequent treatments by specialists, the chief question to be resolved is whether the full specialist fee is to apply for the first treatment

It seems to be the consensus of opinion of those surgeons with whom we have spoken that a fee somewhat in excess of $5 00, but not $15, should be paid to the specialist in surgery for all first treatments, and not the general practitioner's fee of $3 50 for first treatments Perhaps a fee of $7 00 or $7 50 might be agreed upon as an adequate fee, or a fee of $10 for all first visits not referred by a general practitioner to the specialist

In line with the recommendations of the House of Delegates we should recommend that there be a revision of the fee schedule at the expiration of one year from the date of its promulgation Special attention should be given at that time to such revisions as are deemed necessary but particularly to the fees paid for x-ray examination which have not been increased in the present schedule The fees for specialists in physical therapy are also inadequate

At the last meeting of the Council, Dr Walter P Anderton reported the receipt of a letter from Dr Francis M Conway, chairman of the Medical Practice Committee, concerning the advisability of having more frequent revisions of the fee schedule based upon some economic yardstick which might be applied in accordance with the upward and downward swing of the cost of living We enclose herewith a memorandum based upon the research of Dr Frank G Dickinson, director of the Bureau of Medical Economic Research of the American Medical Association, as to the comparative increase in the cost of medical care and in the cost of living This might serve as a basis for determining the relationship between medical fees in effect and the actual cost of living as estimated through the United States Bureau of Labor Statistics The entire question of future changes in the Workmen s Compensation fee schedule was referred to the

[Continued on page 2758]

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[Continued from page 2754]

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[Continued on page 2758]

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[Continued from page 2758]

Appointments—Dr Aranow, chairman of the Legislative Committee being seriously ill, the president, Dr Simpson, requested and *was voted* approval of the appointment of Dr Frederic W Holcomb of Kingston as acting chairman of the Legislative Committee

Elections—Dr Dan Mellen of Rome was elected trustee to fill the vacancy left by the death of Dr Albert A Gartner

Dr Frederic W Holcomb of Kingston was elected Councilor to fill the unexpired term of Dr Dan Mellen

World Medical Association—Dr Bauer made the following verbal report

As most of you know, I got back from Geneva about three weeks ago, where I attended the Second Annual Meeting of the World Medical Association There is a report of the highlights of that meeting on page 436 of the *Journal of the American Medical Association* for October 9 I hope you will read it, but there is one item that I would like to read to you, and I think it is particularly important There were 29 nations represented there, and, surprising as it may seem from these nations coming from all over the world and speaking different languages, these resolutions were adopted unanimously, and I think you will agree that we could very well have written them ourselves They spent nearly a day and a half in discussing the social security and health insurance, because that is a very important factor in their lives They all have it, and they all wish they did not have it They would like to do something to protect what little freedom they have left and, if possible, to get some back that they have lost These are the 12 principles which they adopted, and they were adopted only as being essential if social security includes medical care

(*a*) Freedom of choice of physician by the patient Liberty of physician to choose patient except in cases of urgency or humanitarianism

(*b*) No intervention of third party between physician and patient

(*c*) Where medical service is to be submitted to control, this control should be exercised by physicians

(*d*) Freedom of choice of hospital by patient

(*e*) Freedom of the physician to choose the location and type of his practice

(*f*) No restriction of medication or mode of treatment by physician except in case of abuse

(*g*) Appropriate representation of medical profession in every official body dealing with medical care

(*h*) It is not in the public interest that physicians should be full-time salaried servants of the government or social security bodies

(*i*) Remuneration of medical services ought not to depend directly on the financial condition of the insurance organization

(*j*) Any social security or insurance plan must be open to the participation of any licensed physician, and no physician should be compelled to participate if he does not wish to do so

(*k*) Compulsory health insurance plans should cover only those persons who are unable to make their own arrangements for medical care

(*l*) There shall be no exploitation of the physician, the physician's services, or the public by any person or organization

I do not think we could quarrel very much with those The surprising thing, I think, is that that represents the views of representatives from 29 different nations, including one of them from behind the Iron Curtain if you please, Bulgaria, and they were adopted without a dissenting vote Most of the day and a half's argument was not on the principles but on language, because it is difficult to translate a word into another language and have it mean exactly the same thing I, personally, think that if the World Medical Association had not accomplished anything else—and I think it did—this certainly justifies its existence, and I think it is deserving of support

If any of you perhaps saw the editorial which appeared in the *Journal of the American Medical Association*, I think two or three weeks ago, urging state and county societies and national organizations to become supporting members of the United States Committee of the World Medical Association, I wish to talk on that

As you know, the income of the World Medical Association itself is infinitesimal in that it gets only dues from member associations, many of whom are broke, and, if they are not, they cannot pay their dues because they cannot get their money out of the country We had, up until last April, three bank accounts, one in Zurich, one in Paris, and one in England The money in France and England can only be spent in those countries, because they cannot get it out, so we established a new one in New York in April, to which our own dues (the American Medical Association's dues) and the dues of the Canadian and some of the Latin American countries are being paid in dollars here in New York, and where of course we can use it, but even so the income is altogether too little, so that the United States Committee was formed to raise money really to support this thing in the way it should be run One of the strings attached to that offer was that the headquarters of the organization were going to be located in the United States We said North America, but they picked the United States, and that was agreed to, and we have agreed to underwrite the expenses of the Secretariat and the traveling expenses of members of the Council We first thought that it would be done on $50,000 a year Now we know that that is not adequate, it is going to cost $75,000 to $100,000 a year The American Medical Association, the Mayo Clinic, the International College of Surgeons have each contributed $2,000 a year toward the support of this Many of the national organizations have contributed The National Foundation for Infantile Paralysis and the American Red Cross have each contributed $5,000 The Pfeiffer Foundation contributed $10,000, and a number of others

Having just passed a budget for next year of $290,000, I am reluctant to ask the State Society to go into it in any great degree, but I note in the budget the Trustees last April appropriated $500 for entertainment of the Council when it was here in April, and that there is $161 of that unspent, so I was wondering if for this year the Council would be willing to recommend to the Trustees that $150 of that amount which has already been appropriated for this year and is in the budget be given to the United States Committee as a membership of this Society

It was voted that the Council recommend to the Trustees that $150 of the amount previously appropriated for this year and in the budget, be given to the United States Committee as a membership of this Society

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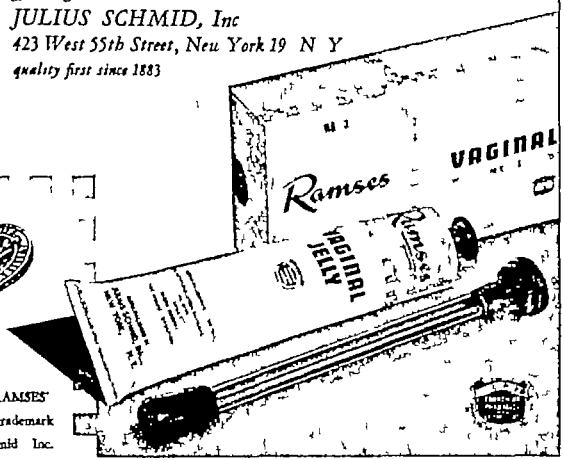
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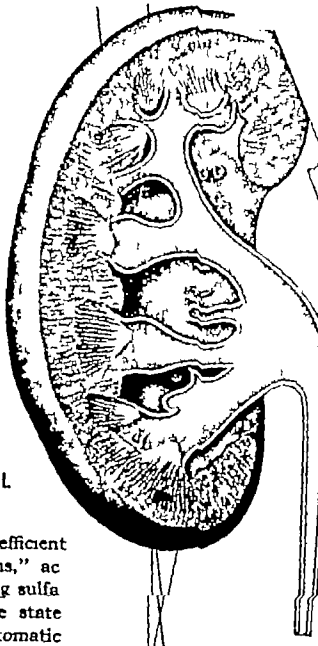
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Officers—County Medical Societies—1948

TOTAL MEMBERSHIP AS OF DECEMBER 15, 1948—22,312

County	President		Secretary		Treasurer	
Albany	J J Clemmer	Albany	A. Vander Veer	Albany	F E Vosburgh	A
Allegany	R. O Hitchcock	Alfred	H G Chamberlin	Cuba	L P Bly	
Bronx	R J Azzari	Bronx	G B Gilmore	Bronx	C W Frank	]
Broome	J C Zillhardt	Binghamton	R S McKeeby	Binghamton	J W Kane	Bingha
Cattaraugus	N P Johnson	Olean	W B Arthurs	Olean	George C Cash	
Cayuga	C T Yarrington	Moravia	J D Hammond	Auburn	L H Rothschild	A
Chautauqua	E O Black	Fredonia	Edgar Bieber	Dunkirk	C E Hallenbeck	Du
Chemung	A C Glover	Elmira	H A Burch	Elmira	E S Ridall	F
Chenango	J A. Hollis	Norwich	J H Stewart	Norwich	J H Stewart	No
Clinton	W W Johnson	Plattsburg	K M Clough	Plattsburg	K. M Clough	Platt
Columbia	L D Carpenter	Germantown	L J Early	Hudson	L J Early	H
Cortland	R. H Kerr	Cortland	E F Higgins	Cortland	F F Sornberger	Co
Delaware	C K Ives	Roxbury	S G Edgerton	Delhi	S G Edgerton	
Dutchess	L W Stoller	Poughkeepsie	J F Rogers	Poughkeepsie	J F Rogers	Poughk
Erie	E D Babbage	Buffalo	H G Walker	Buffalo	E A. Woodworth	Ke
Essex	R J Martin	Ticonderoga	J E Glavin	Port Henry	J E Glavin	Port
Franklin	A A Hartmann	Malone	D H. Van Dyke	Malone	D H Van Dyke	M
Fulton	D M McMartin	Johnstown	R. K Lenz	Gloversville	W H Raymond	John
Genesee	D B Johnson	Batavia	C C Koester	Batavia	C C Koester	B
Greene	W A Petry	Catskill	W M Rapp	Catskill	M H Atkinson	C
Herkimer	R. W Dennis	Herkimer	R C Ashley	Little Falls	R. C Ashley	Littl
Jefferson	L O Fox	Brownville	C A Prudhon	Watertown	L E Henderson	Wate
Kings	A W M Marino	Brooklyn	C H Loughran	Brooklyn	H Mandelbaum	Br
Lewis	L A Avallone	Lowville	E A Barnes	Lowville	E A. Barnes	Lo
Livingston	F J Hamilton	Hemlock	R A Hemphill	Mt Morris	R. A. Hemphill	Mt
Madison	R B Cuthbert	Canastota	F O Pfaff	Oneida	J F Rommel	(
Monroe	E B Soble	Rochester	J A. Lane	Rochester	J L Norris	Roc
Montgomery	R. E Wytrwal	St. Johnsville	D W Childs	Amsterdam	F F Pipito	Amst
Nassau	H A. Butman	Manhasset	I Drabkin	Rockville Centre	I Drabkin	Rockville
New York	William B Rawls	New York	B W Hamilton	New York	C W Cutler	New
Niagara	W W Pierce	Lockport	C M Dake	Niagara Falls	F A Lowe	Niagar
Oneida	James I Farrell	Utica	H H Dodds	Utica	R. C Hall	
Onondaga	J G F Hiss	Syracuse	I L Ershler	Syracuse	A. C Hofmann	Sy
Ontario	Robert E Doran	Geneva	Carl B Smith	Victor	Carl B Smith	
Orange	T R. Proper	Newburgh	E C Waterbury	Newburgh	E C Waterbury	New
Orleans	A F Leone	Medina	J G Parke	Albion	J G Parke	
Oswego	J L H Mason	Pulaski	U Cimildoro	Oswego	U Cimildoro	O
Otsego	E J Keegan	Oneonta	J M Constantine	Oneonta	J M Constantine	O
Putnam	R. S Cleaver	Brewster	F J A Lehr	Carmel	G H Steacy	Ma
Queens	Alfred Angrist	Jamaica	E A Wolff	Forest Hills	D M Raskind	Long Islan
Rensselaer	C J Handron	Troy	H F Albrecht	Troy	H C Engster	
Richmond	J H Diamond	New Brighton	R. E Lucey	Stapleton	H Dangerfield	St
Rockland	G G Stone	Suffern	R. L Yeager	Pomona	M R. Hopper	
St. Lawrence	P T McGreevy	Massena	W R. Carson	Potsdam	L T McNulty	Po
Saratoga	F A. Mastrianni	Mechanicville	M J Magovern	Saratoga	J M Lebowich	Sa
Schenectady	N H Rust	Scotia	R. E Isabella	Schenectady	Harry Miller	Schen
Schoharie	J H. Wadsworth	Cobleskill	D R. Lyon	Middleburg	D L Best	Midd
Schuyler	F C Ward	Odessa	C W Schmidt	Montour Falls	C W Schmidt	Montou
Seneca	C M Smith	Waterloo	Bruno Riemer	Romulus	Bruno Riemer	Rc
Steuben	V S. Higby	Bath	R. J Shafer	Corning	R. J Shafer	C
Suffolk	W S Stakes	Patchogue	E P Kolb	Holtsville	David Corcoran	Centra
Sullivan	R. S Breakey	Monticello	D S Payne	Liberty	D S Payne	L
Tioga	A J Capron	Owego	I N Peterson	Owego	I N Peterson	(
Tompkins	H W Ferris	Ithaca	Richmond Douglass	Ithaca	Richmond Douglass	
Ulster	E S Goodyear	Kingston	F H Voss	Phoenicia	H B Johnson	Ki
Warren	Saul Yafa	Glens Falls	A C Davis	Glens Falls	A. C Davis	Glen
Washington	John A. Summer	Granville	D M Vickers	Cambridge	C A Prescott	Hudson
Wayne	J H Arseneau	Lyons	I M Derby	Newark	I M Derby	N
Westchester	W G Childress	Valhalla	W A. Kelly	Mount Vernon	R. R. Heffner	New R
Wyoming	O T Ghent	Warsaw	P A Burgeson	Warsaw	P A Burgeson	W
Yates	R. H Davis	Penn Yan	W G Roberts	Penn Yan	W G Roberts	Pen

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